GOLDSMITHS JOURNAL

27

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NORTH AMERICAN
GOLDSMITHS

Volume V, Number 6
December 1979

International Dutch Silver Exhibition
Jan Jacobsz
Nautilus Cup, silver gilt, shell, 1596
Credit: Toledo Museum of Art

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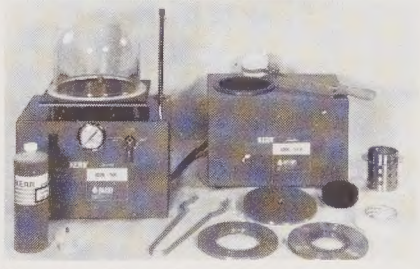

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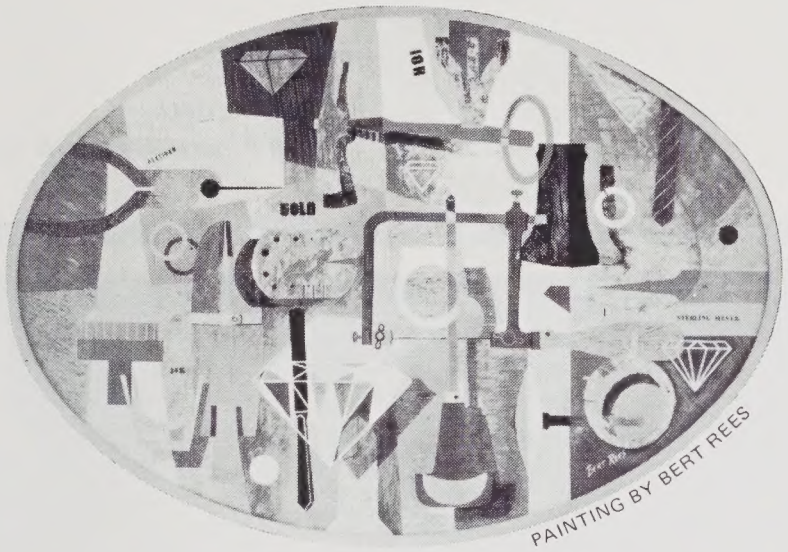

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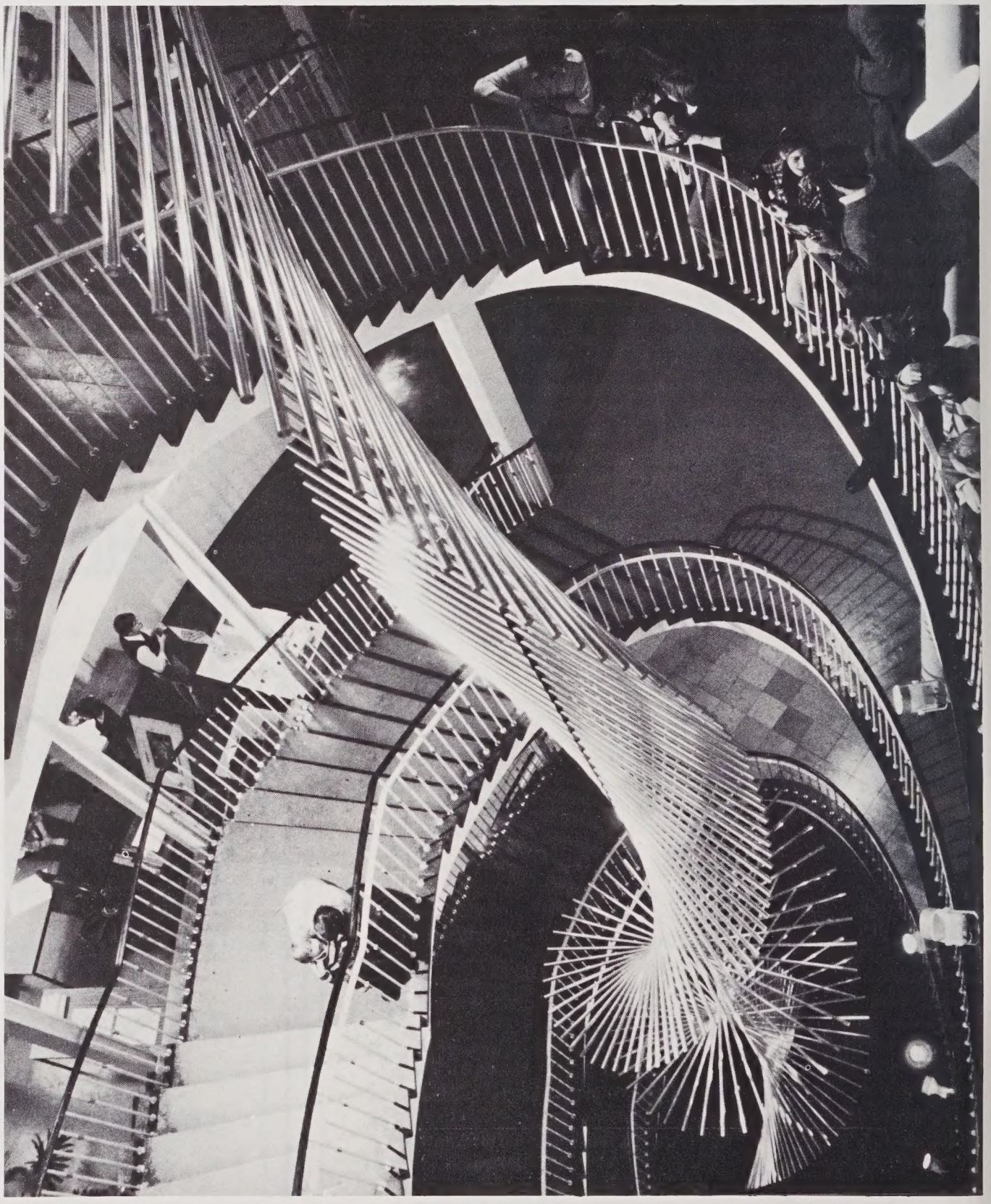
REVIEWS

A SHOW IN GERMANY: SCHMUCH UND GERAT— JEWELRY AND OBJECTS

by Ann Grundler

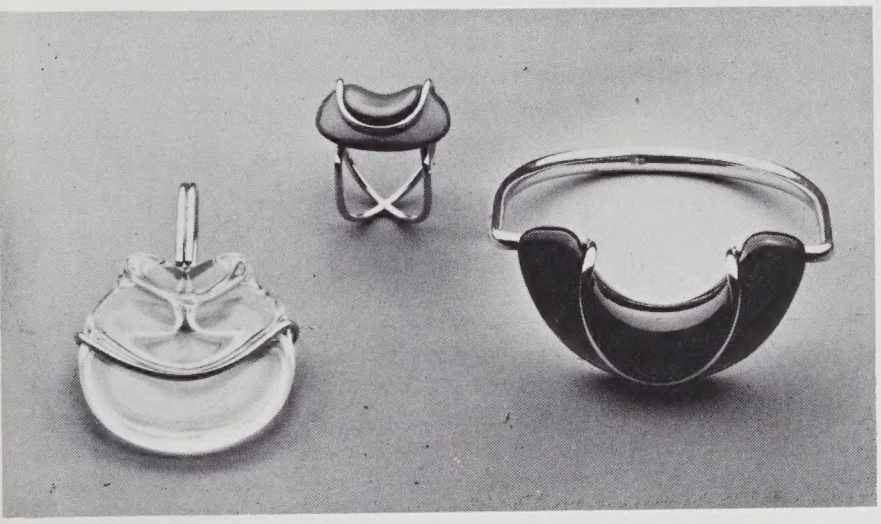
Friedrich Becker
Large Kinetic Waves, 75' high



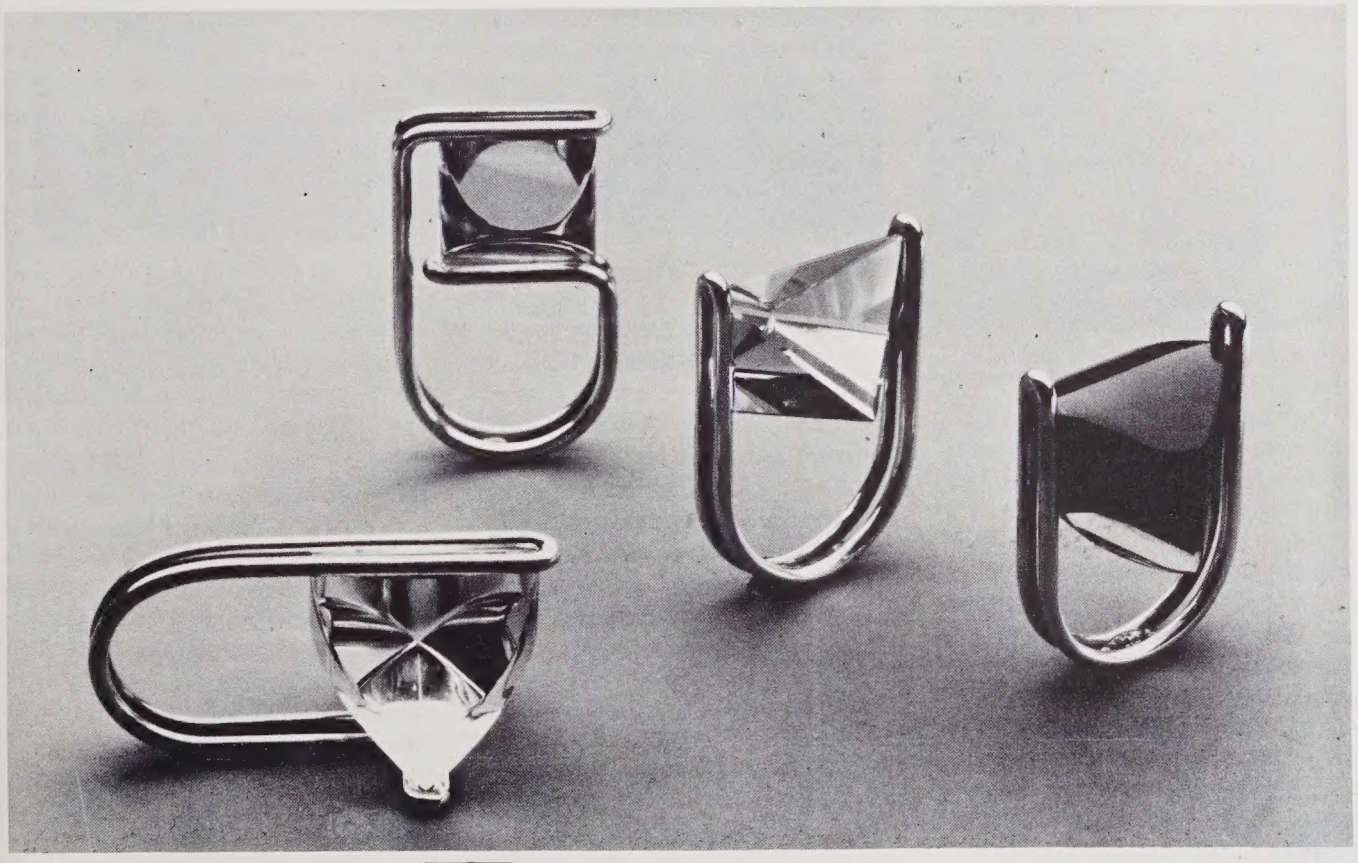
Jewelry and Objects: Under this title 27 students and their professors Friedrich Becker and Sigrid Delius had a show at the Stadtische Kellergalerie in Dusseldorf, Germany. The show was from May 16 - June 10, 1979 and showed rings with custom cut gemstones, formed bracelets, a crocheted necklace made from fibers and wire, knitted head decoration, brooches of soft forms made from metals of different colors, cutlery, and containers. Sigrid Delius exhibited six stickpins with a-jour enamel and Friedrich Becker was represented with his 23 meter high Kinetic Waves, activated with an electric motor and hung in the stairway of their school.

The show represented the joint efforts of students and faculty. What confidence the professors must have had in their students to organize this show and in return, that must have produced the greatest efforts by the students. The results also show the numerous awards the students received as listed in the back of the catalog.

In a design-competition sponsored by De Beers Consolidated Mines Ltd. for the students of Fachschulen and Fachhochschulen, the relatively small student body produced six winners out of a possible ten. Of course, it was also an opportunity to show the public what the design department of the Fachhochschule in Dusseldorf has to offer.



Ruth Hombergs
Student at Fachhochschule Dusseldorf
Pendant with rock-crystal, Ring and Bracelet with smoky quartz



Friedrich Becker
Two-finger ring, white gold, yellow diamonds

Hans Georg Gantenbrink
Student at Fachhochschule Dusseldorf
Rings with amethyst, rock-crystal and smoky quartz

METALS DEPARTMENT ANNUAL AND NATIONAL INVITATIONAL EXHIBITION — VISUAL ARTS CENTER OF ALASKA

by Kes Woodward

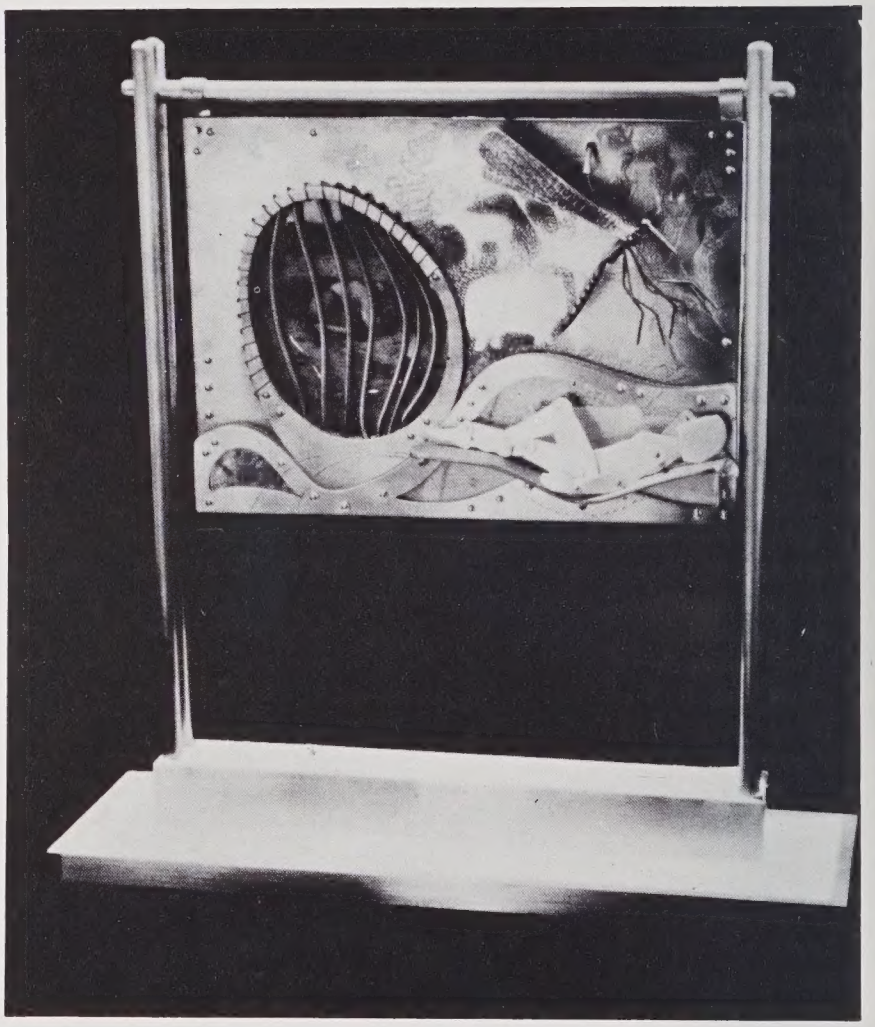
From June 24 through July 20, 1979, the Visual Arts Center of Alaska held its first Metals Department Annual and National Invitational Metalsmithing Exhibition. The first large scale showing of contemporary metals in this state, the exhibition included 77 works by 31 artists, including six artist-participants of the Center and such widely recognized figures as David LaPlantz, Gene and Hiroko Pijanowski, J. Fred Woell, Dan White, Carol Wilcox, and others.

This striking exhibition was only one of four large invitationals organized by the Visual Arts Center in 1978-79. The Center, a private, non-profit organization dedicated to the encouragement and promotion of contemporary art in Alaska, has well-equipped studios in metals, sculpture, printmaking, and fiber, and a large exhibition space devoted to monthly exhibitions. In 1978-79, they combined annual departmental exhibitions with large scale invitationals, introducing the work of many nationally known artists to Alaska.

The Metals Department, perhaps more than any other, has undergone a period of rapid growth in the past year. Largely responsible for the leap in quality and ambition is Deborah Nore, Artist-Manager of the Metals Department for slightly more than a year and an excellent metalsmith in her own right. Trained at Humboldt State University under David LaPlantz, she has participated in numerous competitive and invitational exhibitions in the past two years, and her work "Let's Pray for a Drought" is among the most exciting in the exhibition. A mixed-media construction of brass, copper, plexiglass, silver, and other materials, it shares with other strong work in the show an emphasis on combining flawless craftsmanship and technical accomplishment with strong personal expression.

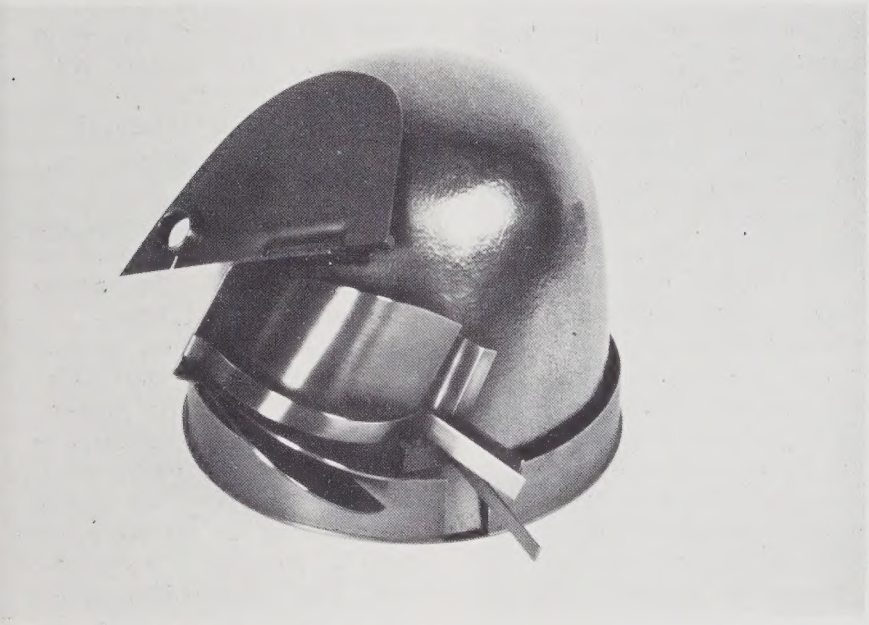
The exhibition, intended as somewhat of a survey and introduction to contemporary metals, is representative of the kinds of work being done nationwide. Unfortunately, much of the work included shares with that of many other well-known metalsmiths — the tendency to apotheosize craftsmanship to the exclusion of meaningful content on any level. Perhaps more than anything else, it is the widespread image of this kind of beautiful but conceptually vacuous work, synonomous with contemporary metalsmithing, that is responsible for the difficulty young, ambitious metalsmiths have had in being accepted as serious artists on par with those in other media.

However, included in the show are many artists whose works represent a growing tendency toward personal expression and involvement with ideas. Jean Mandeberg's "Spider Box" is an excellent example of how strong technical training and preoccupation with formal kinds of visual relationships can serve personal expression. This elaborate structure may be viewed on one level as a purely formal exercise in relationships of open, enclosed, and semi-enclosed spaces. While on an entirely different level, it is charged with energy by its non-esthetic content. Conceived as an elaborate chamber for the capture and ritual destruction of spiders, it is obviously not seriously intended for use. Its menacing 'purpose' nevertheless, takes it out of the realm of pretty objects and into the area of art as a container for content.



Deborah Nore
"Let's Pray for a Drought" copper, brass, silver, plexiglass, handmade paper, photograph.

Much of the work in the exhibition takes a similar stance towards metals as a medium to be used for making art, rather than a craft whose purpose is simply manipulation of its raw materials in beautiful ways. Others dealing with personal observations and witty, at times meaningful, images in their work include David LaPlantz, Fred Zweig, Dan White, J. Fred Woell, and Lynn Wegenka. Zweig, an artist-participant of the Visual Arts Center, is one of the beneficiaries of a strong workshop program undertaken by

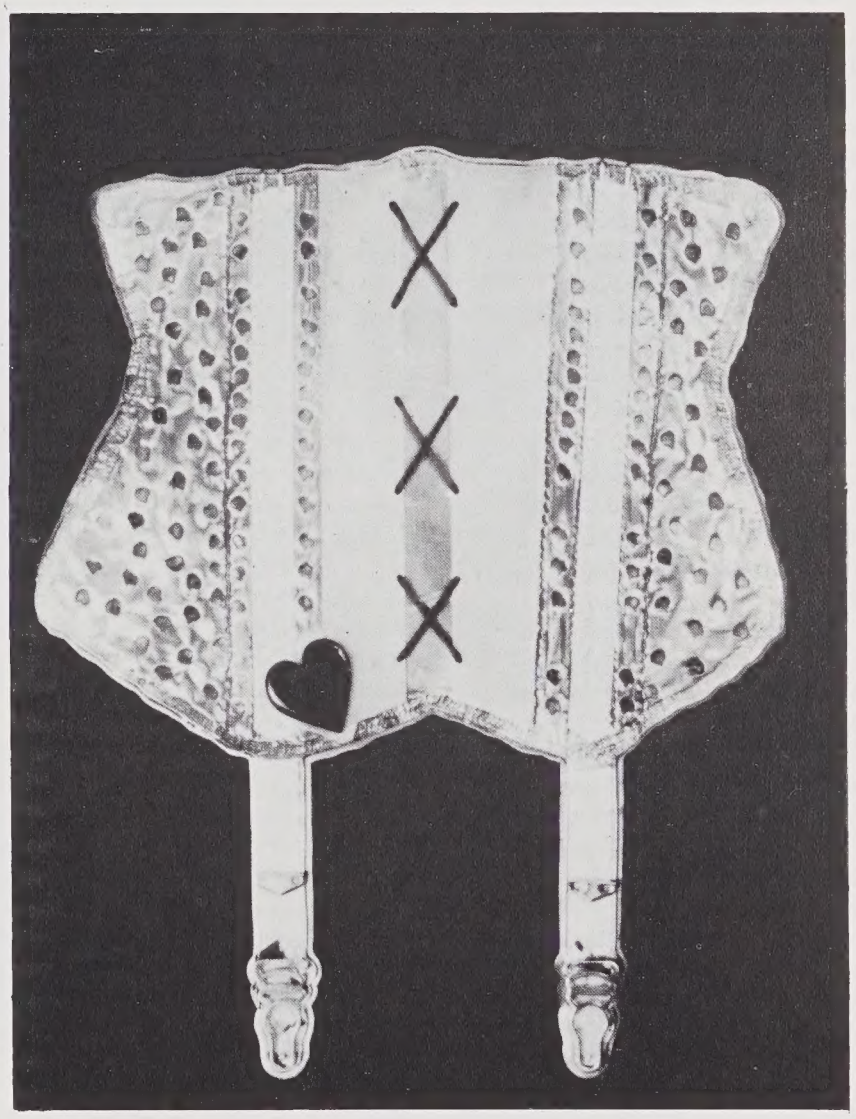


Jean Mandeberg
"Spider Box" raised and fabricated copper.

the Center, which this year in metals included two-week workshops by LaPlantz and Holly Sparkman. Zweig's "Dime Bank for Captain Demo" is a frank hommage and "thank you" to LaPlantz for his impetus and training in the first of those workshops, and his "Reliquary for the Moon" and "Dream Container" are evidence of a willingness to tackle personally meaningful images with an already considerably developed technical ability.

If it was a little disappointing for those of us who keep up with contemporary metals to see many of the same works in this show which have been in numerous others, it was nice to see work by LaPlantz, the Pijanowski's, Dan White, J. Fred Woell, Kay Yee, Harlan Butt, and Alan Revere in Alaska at all. The impact of the work (by these and other outstanding metals artists) on the public and emerging metalsmiths in Alaska was considerable. Perhaps the most long-term effect will surface on those working metals artists in Alaska. There are several — Robert Pfitzenmeier, who is doing interesting work dealing with the Alaskan topography, and Mariano Gonzales, who is on leave of absence from the Center to attend the Rhode Island School of Design, who along with Zweig and Nore are in a position to make significant contributions to contemporary metals in coming years.

This show was an excellent introduction to contemporary metals for the people of Alaska. It is hoped that the Visual Arts Center's excellent studio, exhibition, and workshop program will continue to provide impetus for innovative, high quality work in fine metals in this state so far removed from the mainstreams of American art.



Lynn Wegenka
"Corset" copper, plexiglass, satin, silk, thread, rose petals, steel, and brass.

Kes Woodward is Curator of Visual Arts at the Alaska State Museum.

LOOT/SUPER LOOT 1979

by Graham Hughes

'Loot' is part of the Worshipful Company's programme to encourage good craftsmen. The aim is to give a smart shop window to some of the best small British workshops, so that they can achieve a powerful group impact. There are probably more small producers in Britain than in any other country and 'Loot' has become central to their survival and prosperity.

We have tried to invite all the most promising designers to participate, so we can reasonably claim this exhibition as a cross-section of the best new British silver & jewels. We selected well-made original pieces, which are always the most difficult to sell and which therefore need encouragement, and we omitted the cheaper mass production and the copies of antiques which together constitute this country's main turnover in silver & jewels. Loot represents modern imagination, not the re-interpretation of old traditions.

This is the fourth big Loot exhibition held by the Company. The first was at the Hall, the second and third at the Hall where we took orders for some £100,000, and in Leeds City Art Gallery; the fourth in the biggest new museum building in USA, the Minneapolis Institute of Art, where we attracted record crowds. We have presented smaller shows under the same magnetic name in the Eli Gera Gallery, Old City Jaffa, Israel; the Peter Rutzmoser Gallery in Munich; the BD Howes store, Palm Springs USA, and accompanying our "Treasures of London" exhibition in Jacksonville, Florida; the Centennial Museum, Vancouver; and the Musee des Beaux-Arts, Montreal. These successes gained, do great credit to Britain's craftsmen.

We can also claim that the Loot machinery has worked well. By careful selection, which is a delicate and difficult job, we have reached a good standard of exhibits. We have proved our case, that excellent work need not be too expensive; the maximum Loot selling price was £50, is now £100; and we have revealed a steady but exciting trickle of hitherto unknown talent. Each year, there have been about a hundred exhibitors whom we have never met before, so Loot has proved a healthy clearing house for craftsmen who want to become better known, as well as a thriving sales place for beautiful gold & silver. Much of this treasure is almost impossible to locate in the remote country workshops where it is made, so Loot is a sort of metropolitan depot for a decentralised but thriving British craft industry.

This year we have 996 pieces in Loot, made by 398 artists and factories. They cover as usual the full financial range, from £1 up to £100. But there is an important experiment. The Craft Committee treasure the reputation of Goldsmiths' Hall as a home of the finest quality goldsmiths' work. It seemed a pity to discourage Loot exhibitors from ever making an occasional expensive masterpiece for this building, which is probably more associated with masterpieces than any other in London. The Company's apprentices for example — usually two dozen a year — still show their masterpiece to the Wardens at the end of their four or five years' training at the bench. And we have many competitions to test the virtuosity today of ancient and modern techniques. So we have invented "Superloot" for 1979, to demonstrate how far our economically minded Loot fabricators, can extend themselves into a luxury field.

Superloot pieces — there are 142 from 80 suppliers — each cost £500 or above, the most expensive being £10,000, a pair of diamond earrings with 2ct diamonds by Nevin Holmes. Our visitors will decide whether the extra elaboration and fantasy, is worth the extra money.

Just over 2,000 pieces were submitted in all, of which we accepted 1,138. To receive muster, select, list, label, catalogue and display so much, with a very small staff in a period of only five weeks, involves a big administrative and decision-making burden. To alleviate the cost, we charge £2 handling fee for every piece sent in, whether it is shown or not. The trouble involved here for a rejection is similar to that for a success. We try to include at least something from every submission, whilst at the

Diane Hobson
Bowl, removable centre, glass carving

same time maintaining a stimulating overall professionalism and a good balance of styles. We take no profit from sales — we simply put buyers in touch with sellers, and try to help them both to achieve satisfaction.

Some of our supporters are famous, like Stuart Devlin. He is in Loot to prove that, despite his spectacular success (he has just opened his splendid new shop in Conduit Street), he still wants to make good pieces that almost any silver buyer can afford. Indeed, the ability to keep his prices down whilst making profits and conducting his world-wide luxury export business, is one of his unsung triumphs.

Other innovators in the under £100 class include metalwork teachers: at the new department in Camberwell college of art, Lawrence Sparey, with his elegant geometry in plastics, and at Dundee, Roger Millar with his engineering fantasies. Also teaching at Camberwell is Edward De Large, whose beautiful and precise colouring of titanium is well known to Loot visitors. He helped to select this year's offerings, and was himself selected to be a British government Bicentennial Fellow, spending a year in U. S. A., an honour and opportunity for him. Sieglinde Brennan has evolved a type of sunrise motif which we hope

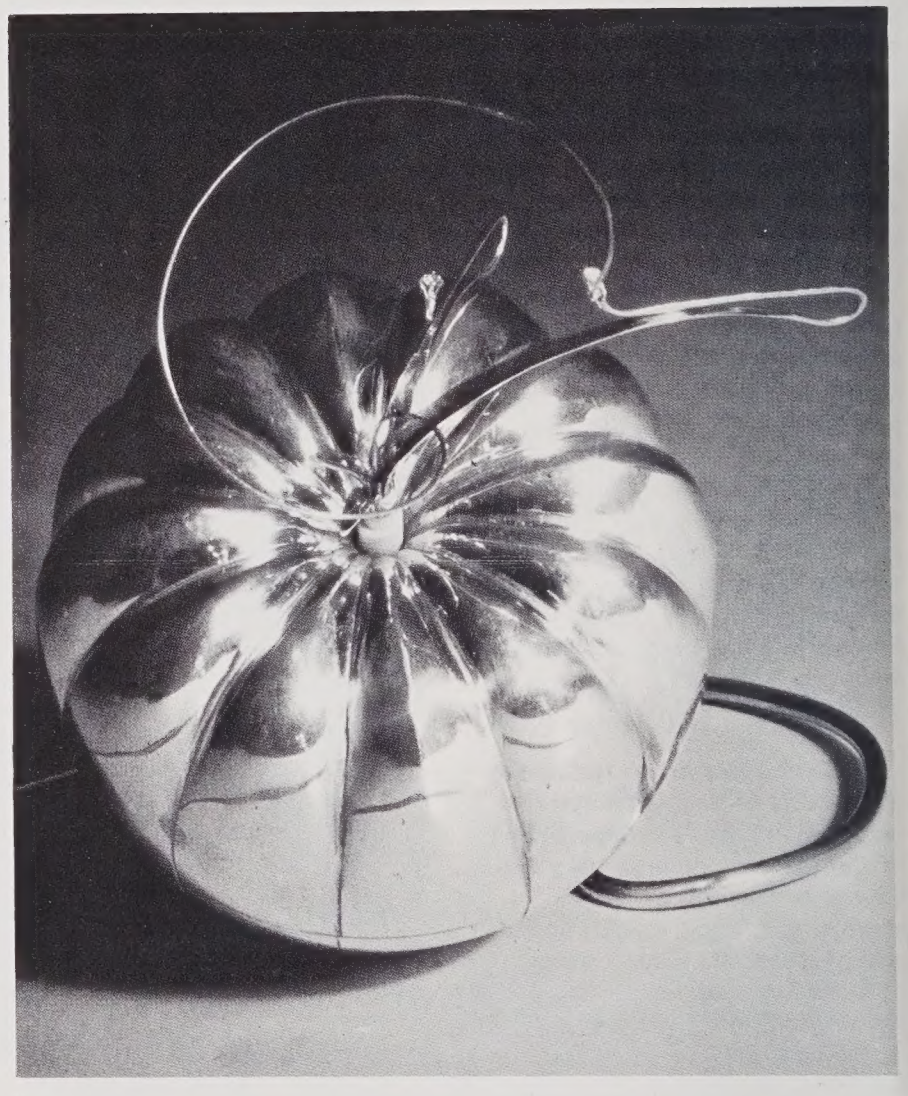
John Willmin
Flower sculptures, ebony base, porcelain, silver/gilt filigree, ivory seed pod

will be symbolic of her own career: she last featured at Goldsmiths' Hall as a student in Middlesex Polytechnic in our 1978 student selection "Passing Out." Jesus Tellosa from Mexico, brings a painterly dash to our precious metals. Caroline Broadhead causes the thinnest textures and newest fabric threads to make the biggest possible contribution to ornament. By contrast, Michael Bolton likes silver to look solid and heavy. He often achieves his fascinating textures, reminiscent of some ancient Roman excavation, by using a sledge hammer on a much-worn farrier's anvil.

Some of our foremost craftsmen are performing as champions both of economy and of superlative luxury: Jacqueline Stieger, sculptor and mastercaster, has contrived for us this year, yet another lovely filigree texture, a cross between vermicelli and a well-rolled lawn of grass. Wendy Ramshaw has treated us to balusters and spindles before. Now we can have them supporting big groups of rings if our fingers are long; if our purses are short, the rings come single and witty, from mainstream Loot. Her ex-student Diana Hobson makes delicious milky silver enamels which conceal mysterious and intricate clocks and musical boxes. Marilynn Nicholson's lacy agate slices bring the peaceful wonders of nature to the jeweler's bench; her huge silver necklace is a noisy brilliant firework. Carl Faberge's grandson Theodore, shows some of the family taste for perfection, this time an extension of the turner's circular vision.

In Superloot there are statements by some of the country's most dintinguished names: for instance, John Donald, with his deep carved flowers, Louis Osman, whose workshop is in one of Britain's largest mansions, Geoffrey Turk, flushed with the success of a big Japanese export contract, all frequent and welcome visitors to the Hall. Anthony Elson is reviving chasing (or embossing with hammer & punch), until recent thought to be a dying craft: his swirling lines come from an art nouveau dream, but they are unique. John Willmin was commissioned by the Company to make our 650th birthday coffee urn — his fantastic flowers look back to his sculptor's training. David Watkins has an almost modular style, now as much at home in diamonds and gold, as it always has been in acrylics. John Barker is a newcomer with an exotic clock, pretending to be an apple with seductive curling hair. David Hensel achieved sell-outs recently in London's Electrum Gallery and in Munich's Rutzmoser Gallery at the Company's exhibition there. These followed his public launching as a jeweler in Loot '77 when he told us rather apologetically that he was "really a painter," which looks distinguished on our front cover. We think he has now made himself into a real jeweler and we congratulate him on his lovely family which he has temporarily lent us in his ring.

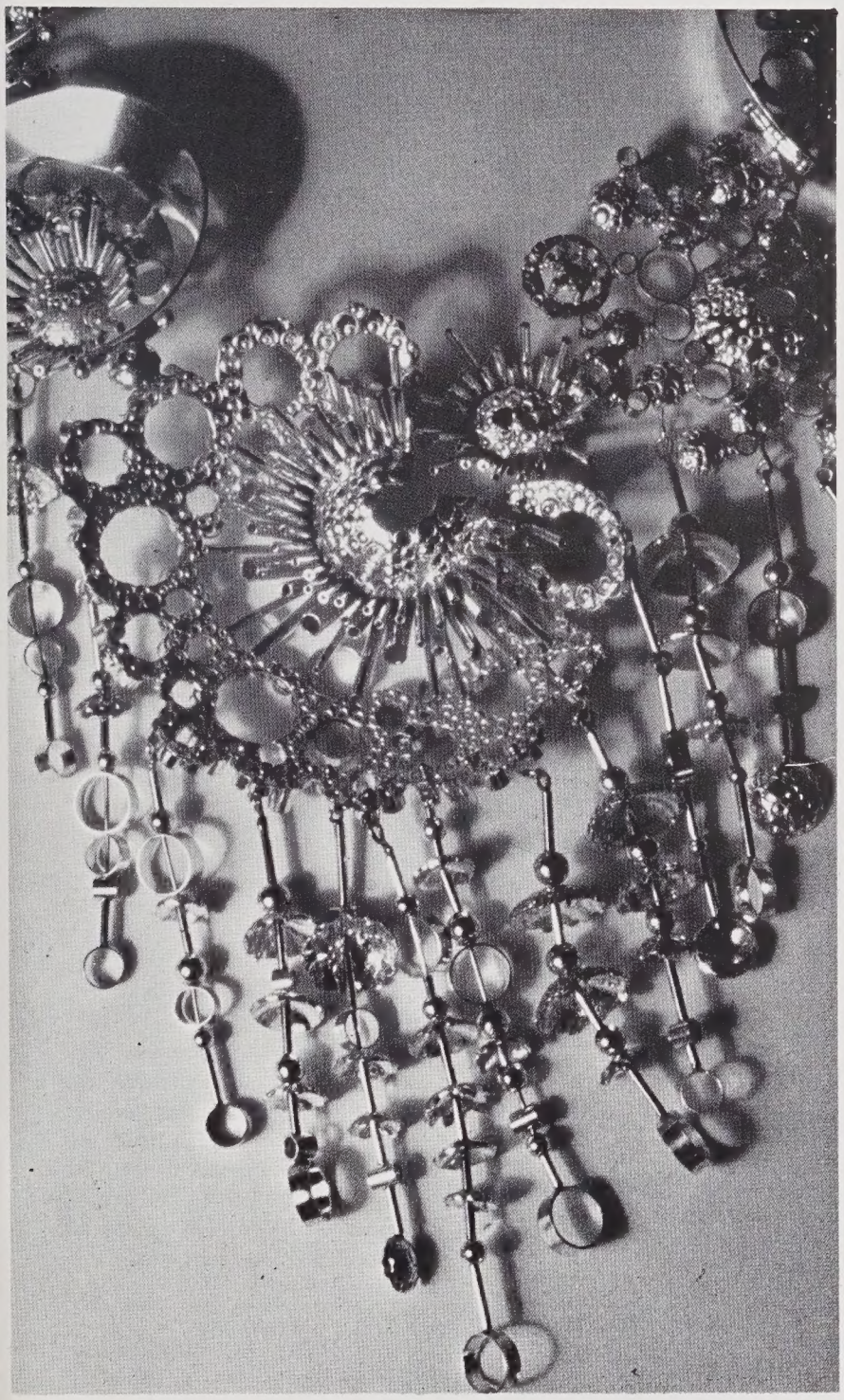
'Loot' exhibitors come from every sort of origin: hence the freshness of the exhibition. We have a naval architect, a Jungian psychoanalist, a maker of opera headdresses and a dental technician whose castings doubtless retain the exact size of the original, eliminating the normal shrinkage. Jackie Mina has sensibly invented the name 'solo-show' to describe a woman's one-man show. Birthplaces include Athens, Brazil, Budapest, Israel, Italy and the Netherlands. Many of the best craftsmen have trained themselves at home. If 'Loot' is wonderful, that is because its contributors are so different one from another.



John Barker, Clock, silver and diamonds

Loot is always moving: if it stays still, it may cease to be desirable, and die of respectability. There are plans to take it to Israel and Los Angeles in 1979, and to Australia in 1980.

We depend for our success on the help of our friends. The Craft Committee thanks them all. If Loot '79 helps to launch its younger craftsmen into a successful career, all our efforts will be justified.



Marilynn Nicholson
Silver Sea necklace

Sieglinde Brennan
Brooch, oxidized silver with gold fusing

(courtesy of Goldsmiths' Hall, London)

"COLLECTIBLES" SPRING STREET ENAMELS

by Antonia Schwed

"Collectibles," at the Spring Street Enamels Gallery of Soho is a thoughtful and elegant exhibit. There is a somewhat different ambiance in this show, for the works of each artist are, as far as possible, grouped together instead of being scattered throughout the gallery. I found it an impressive way of displaying the work.

First, the viewer is met with the handsome champleve enamels of Fiammetta Rubin. Her work is bold and different; the etching is shallow but not lacking in richness for she lays on her thin, thin layers of enamel with artistry and makes much use of the basse taille technique — that is, the etching of the metal underneath the enamel. Her clock panelled with intriguing champleve scenes is indeed a "collectible," as is her Kabbala — a stunning piece which "represents the mystical relationship of God and man through the spirits in the universe." It is made up of seventeen basse taille discs in blues and a sort of soft dove color, plus beautifully etched unenameled brass sections, all of which are joined by subtly colored narrow strips of macrame. I have only one quibble about any of her splendid work — she does have one necklace on which she has used cold enamel. Such an artisan as Rubin should not use plastic in a piece of fine jewelry, in my opinion. The aura I get from plastic, jars with that of the beautiful vitreous enamel pieces all around.

The visitor should be sure not to overlook the wall-case by the door which contains some particularly delightful grisaille by D. X. Ross and several smaller graceful pieces by other artists.

Elvie Zell has contributed a grisaille "Egg Roll Dragon," mounted in a shadow box, that is a humorous and charming piece.

Roseanna Tendler Worth is represented by an intriguing group of bowls and plates done in "raku" enamel. I was chiefly interested in this work because of the imaginative technique — a technique basically involving the dramatic and unpredictable effects of burning organic material and enamel, and possibly the addition of chemicals for lusters. I did feel, however, that she could have used yet more imagination in the actual forms themselves.

As usual the work of Hilda Kraus, set off in a case of its own, gleams with the beauty and discipline of her work that is always a joy to see.

Lamis Feldman has produced playful and skillful pieces of enameled foil — a "paper" bag filled wih real popcorn; a whole amusing shopping bag made of foil, among other clever and entertaining tours-de-force.

A comparative newcomer to enameling is Ide Goldman and her work in this show is creative and feeling. Her designs are rhythmic and flowing, and it is clear that she is a painter from the rich working of colors in her jewelry and her small pictures, both cloisonne and champleve.

Kristin Anderson's work was new to me, and a wonderful discovery. Not only is she a first rate silversmith, but she does exquisite enameling. She has made some lovely small champleve pieces — which, small and delicate as they are, have all been done with great skill by the cut-out-and-solder-together champleve technique. A real collector's item, in my opinion, is her crystal clear basse taille tree scene pendant.

Among other distinguished "collectibles" is the work of Ruth Markus, Rita Blum, Myriam Bedolla, Bill Ehmer, James Malenda. And that of Gail Rapaport. Rapaport's cloisonne is outstanding even in this era of cloisonne renaissance. All of her beautiful pieces have the added bonus of being hand engraved with delicate designs on the back.

Joan Itzcovitz has a glowing work called "Beyond Freedom." It consists of six circular forms

Fiammeta Rubin
Enamel Wall Hanging, copper with gold plating mounted on wood

of graduated size and mounted on lucite. The vibrant colors seem to slide from disc to disc with an interesting interflow of warm and cool.

Of course there are other fine artists in this show, but I have, because of space, only mentioned those whose work impressed me the most. This is, I suppose, the bias any human reviewer possesses — perhaps some day we will review by computer!

As I am an enameler myself (with work in this show) I'm obviously all for people collecting enamels, and this is indeed an exhibit of "collectibles."

BOOK REVIEW

SIGURD PERSSON SILVER

Reviewed by Klaus Kallenberger

Kristin Anderson
Champleve Enamel Pendant, silver, stones

Sigurd Persson Silver by Sigurd Persson and Sune Sundahl (photographer) is printed by Anne Tozckare, Stockholm, Sweden and distributed by Seelig and C. Stockholm, Sweden. Cost not available at this writing. Metallic silver paper; ISBN 91-970-306-0-0; Pale gray board hardcover, 12" x 12"; Jacket with photo of Persson in his studio.

This is a book about fine design and workmanship in holloware. The text consists of a one-page statement by Sigurd Persson in English, Swedish and German. The rest of the book is a portfolio of Persson's work, exquisitely photographed by Sune Sundahl. All photos are in black and white. The last four pages are a catalog of the work, giving dates, materials and ownership of each piece in the book.

Persson's work covers his career as a silversmith from the 50's to the 70's. His style is restrained, bold and elegantly functional. He designs all his own work and pictures a wide range of objects all executed in silver. His strongest forms are his containers and beverage servers (tea pots, pitchers, cups).

While he is able to completely eradicate all tool marks, he prefers to show them in most of his work. There is no surface ornamentation, no needless mechanism or finial — rarely a foot or rim. Occasionally one sees experimentation with asymmetry which rarely is as strong or as resolved as the round or oval forms.

The most impressive characteristics of Persson's work are its starkness and serenity. The power of the simple lines (contours) are very strongly formed. As there are no distractions with ornament, complexity, engravings or stones, etc., the form demands to be confronted solely on its own simple terms. This sense of form and line appears to have refined itself over the years. Yet, the work illustrated manifests a cohesive, authoritative and sensitive command of a highly personal, proportional vocabulary.

The student and the master of silversmithing would be well advised to become familiar with Sigurd Persson's work. No doubt he is one of the fathers of what we identify as the "scandinavian look" in silver forms. This is a highly specialized book, not meant for everyone. It is a must for the teacher, the designer and the silversmith interested in the roots of design in silver. It is also a joy for the lover of design. Sigurd Persson allows his work to speak for itself. His work needs no assistance.

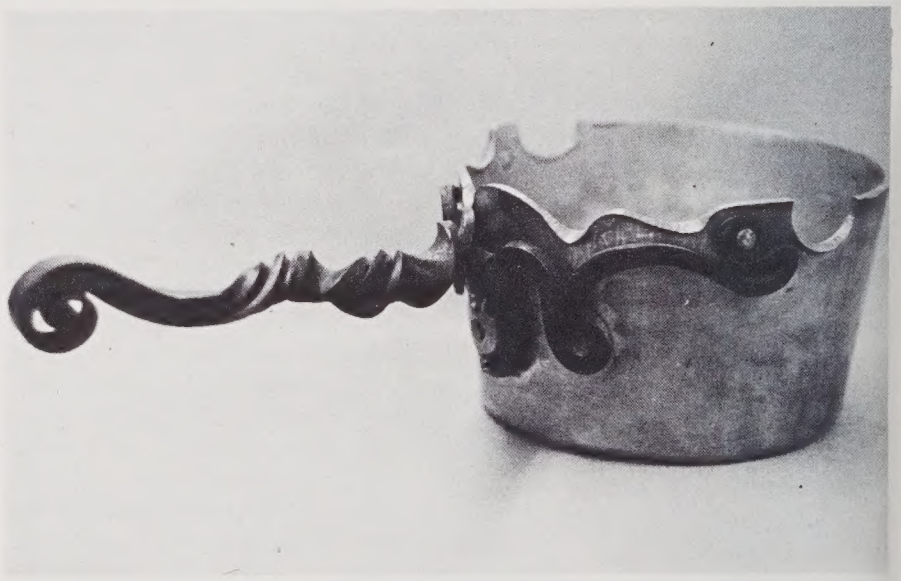
INFORMATION

ALMA EIKERMAN ANNUAL JEWELRY AND SILVERSMITHING FELLOWSHIP AWARD

Professor Leslie Leupp, head of the metalsmithing and jewelry design department, Indiana University, Bloomington, Indiana, announced and presented the annual Alma Eikerman Jewelry Design and Silversmithing Fellowship Award to Kimberly Conrad and David Lawson on September 12, 1979. The recipients, both of Indianapolis, Indiana, were honored at a reception following the awards presentation. This is the second year the award has been given.

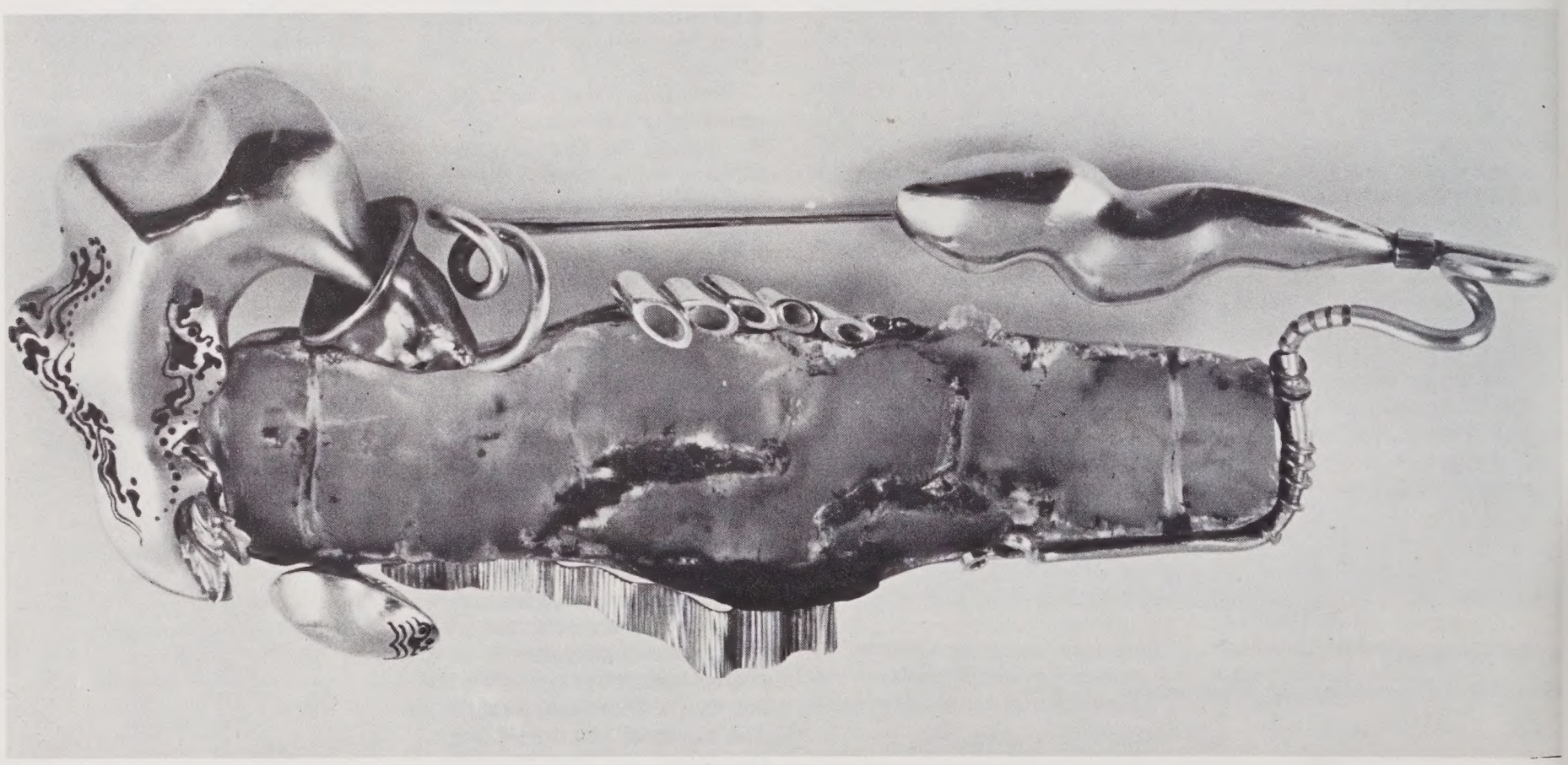
The $500 fellowship, established in Professor Alma Eikerman's name by Indiana University, is awarded to students demonstrating exceptional capabilities, talent, and an aesthetic understanding in metalsmithing and jewelry design.

RECENT METROPOLITAN MUSEUM ACQUISITIONS



Michael Jerry
Cooking Pot, copper, iron, pewter, 7¼" high

Marilyn Davidson
Green Brooch, silver, gold chrysoprase, brass, 6" long



EBENDORF RECEIVES THE GOLDEN STAR AWARD*

Don't ever accuse a past president of SNAG of 'coping out'. Our very own Bob Ebendorf has remained quite active in jewelry affairs and recently became a celebrity of sorts . . . but with a slightly different twist from his usual credentials. On jewelry business in New York City on October 2, he was strolling down 62nd Street toward Lexington when the excitement began.

"Stop those people!" someone was yelling, and as Ebendorf turned around he saw two 'businessmen' attired in three-piece suits, racing toward him, leather bag in hand.

"I stepped to the side as they ran and threw a side body-block, knocking them both off their feet into the street," he recalled.

Nearby construction workers captured one of the men and Bob was left wrestling with the other. He kicked a gun (first) and an attache case holding the jewels (second) from the suspect's hand, but the robber quickly recovered his gun and Ebendorf found himself in the ticklish position of staring down the barrel of a .45.

Sprawled on the sidewalk, Bob realized he was not on top of the bargaining, so he "backed off on my hands and knees." Having aroused a crowd by this time, the gunman got up and fled, leaving the attache full of diamonds and gold jewelry on the pavement.

Frank's Jewelry on Third Avenue was the victim of the theft and thanks to Ebendorf, recovered all of the $500,000 in jewelry and cash reported to be taken.

In reflecting upon the incident, Bob muses "it's amazing what the old adrenalin can make you do." Although friends have since told him he was crazy to get involved, he dismisses the danger by saying, "I was just a citizen responding to a problem."

Some problem. We feel Ebendorf has earned our 'Golden Star Award' and at the very least, a holiday cruise to help him unwind from his efforts.

*Golden Star Award initiated by the Editors and given at their discretion for duty above and beyond.

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OPPORTUNITIES

MAY DEADLINE FOR ENTRIES IN STERLING DESIGN COMPETITION

Entries in the twenty second Sterling Silver Design Competition must be received at the offices of the Sterling Silversmiths Guild of America, sponsors of the Competition, by May 1, 1980, according to the Guild.

The Competition is open to all residents of the United States who are students in a course of design at the college, technical or graduate level during the 1979-80 school year. Entrants may submit one piece—other than articles of personal adornment—designed for functional use or esthetic display. Flatware is eligible in the form of a knife, fork and spoon designed together as a place setting, or in the form of a serving piece.

Entries must be submitted in the form of a finished piece, and must be accompanied by working drawings showing details of construction. Other materials may be used with sterling if desired, but sterling must predominate in the design.

Awards, based on the originality and practicality of the design and the quality of craftsmanship exhibited, total $2,000. First prize will receive $500; second, $400; third, $300; fourth, $200; fifth, $100; and $50 for up to a maximum of five honorable mention awards. In addition to the above, a special prize of $250 will be awarded for the best flatware entry. All entrants are reimbursed for eligible entries at the rate of $4.50 per ounce for the first 25 ounces.

The Gustav H. Niemeyer Memorial Educational Fund will also present matching awards to the schools attended by the five prize-winning students. Funds granted will be for the benefit of the school's metal-working department, to be expended at the discretion of school authorities for equipment, tools, teaching materials or course supplies.

Judges for the 1980 Competition will be Hans Christensen, Professor, School for American Craftsmen, Rochester Institute of Technology; Phillip Johnston, Chief Curator, Wadsworth Atheneum, Hartford, CT, and Burr Sebring, Director of Design, The Gorham Company.

Winning pieces in the 1980 Competition will be shown, along with selected entries, at New York City's Lever House.

Entry blanks can be obtained by writing to the Sterling Silversmiths Guild of America, 1111 East Putnam Avenue,

PENLAND
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summer 16 weeks
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8 weeks

for more information write:

penland school of crafts
penland, north carolina
28765
704/765-2359

RHINEBECK

Rhinebeck opens to all us craftspeople for the first time in 1980. In the past one had to live in Maine, New Hampshire, Vermont, Massachusetts, Connecticut, Rhode Island, New York, Pennsylvania, New Jersey, Delaware, Maryland or Washington, DC. For more information, refer to Exhibition Opportunities section of your Journal.

RENWICK GALLERY EXPANDS CRAFT SALES

The Renwick Gallery Museum Shop has six two-month sales of crafts per year developed around a specific theme. They are interested in expanding the selection of crafts for sale. For further details contact Mrs. W. Vandiver, Smithsonian Institution, MNH Rm. C-222, Washington, DC.

NEW ADDRESS
8245 S.W. BARNES RD.
PORTLAND, OREGON 97225

OREGON SCHOOL OF ARTS AND CRAFTS

AMERICA'S OLDEST CRAFT SCHOOL
WRITE FOR CLASS SCHEDULE OR CALL
503 297 5544

The Craft Center in Worcester, MA is always looking for serious craftspeople interested in serving as part-time adjunct faculty or weekend workshop leaders. We are looking particularly for programs in ceramics, metal-smithing, wood-working, calligraphy, stained glass, enameling and super 8 movie-making, but craftspeople in any field may send inquiries. Interested teachers should send a resume and course or workshop proposal to: Educational Coordinator, Craft Center, 25 Sapamore Rd., Worcester, MA 01605.

General Services Administration will be selecting artists to create works for 27 mural, sculpture, crafts, tapestry, and earth works projects. Interested artists should send slides and a resume to Art in Architecture, GSA, Washington, DC 20405.

The Metalworkers Guild of the Lexington Arts and Crafts Society is interested in one or two day week end or week day seminars on jewelry techniques. Please contact Chairman, Metal-workers Guild, 130 Watham Street, Lexington, MA 02173.

Helen Drutt is planning a major invitational metal exhibition in 1981. Work is presently being reviewed and material can be forwarded to: Helen Drutt, Director of Moore College of Art Gallery, 20th & Race Streets, Philadelphia, PA 19103.

EXHIBITION OPPORTUNITIES

Deadline Date: January 10, 1980. June 28 - 29, 1980, Rhinebeck, open to all us craftspeople. Juried by slides, $15 screening fee. Application forms available from: American Craft Enterprises, Inc., P. O. Box 10, New Faltz, NY 12561, (914) 255-0039.

Deadline Date: January 21, 1980. June 6 - 10, 1980, Craft Market (Festival of Greater Hartford). Juried by slides (Glenda Arentzen—metals). Three $1000 awards. Contact: Craft Market, 250 Constitution Plaza, Hartford, CT 06103, (203) 278-3378.

Deadline Date: January 19, 1980. April 19 - 20, 1980, "7th Annual Midwest Craft Festival," open to all media from Illinois, Indiana, Iowa, Kentucky, Michigan, Missouri, Wisconsin. Juried by slides, $1800 in awards. Contact: North Shore Art League, 620 Lincoln Avenue, Winnetka, IL 60092, (312) 446-2870.

Deadline Date: February 1, 1980. April 16 - May 4, 1980, "Houston Designer Craftsmen 1980 National Juried Exhibition," open to all crafts persons with an entry fee of $15 for non-members or $10 for members. For further information and prospectus write: Houston Designer Craftsmen, 6128 Village Parkway, Houston, TX 77005.

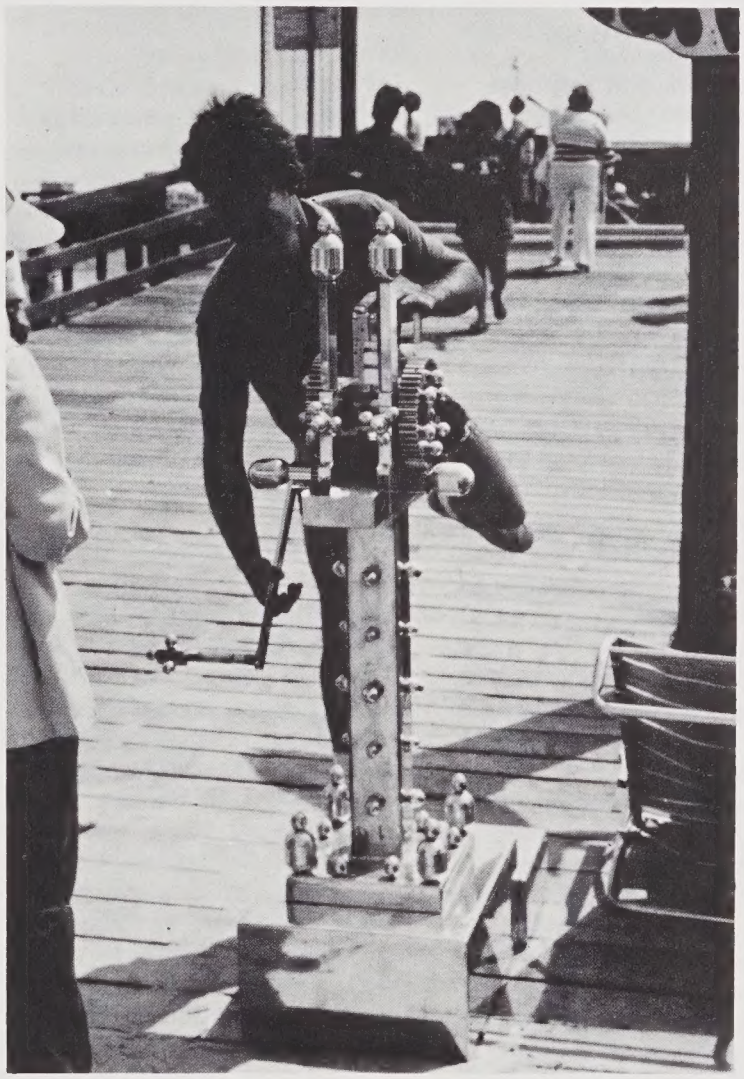
Deadline Date: February 1, 1980. March 7 - 30, 1980, "The 14th Biennial," sponsored by the Creative Crafts Council of Washington, DC and open to all residents of DC, Maryland, Virginia, and Council members residing in contiguous states. For application information, write to: M. Charette, 10245 Farnham Drive, Bethesda, MD 20014.

February 2 - March 15, 1980, "It's About Time," a national competition and exhibition of handmade one-of-a-kind clocks, clock movements and time related craft objects to be held at the Craft Center Gallery. Juried by slides, for a free prospectus write: It's About Time, Worcester Craft Center, 25 Sagamore Rd., Worcester, MA 01605.

Deadline Date: March 15, 1980. For application to the "5th Annual Juried Craft Show," August 1, 2, 3, write: Stowe Craft Show, P. O. Box 1084, Stowe, VT 05672, sponsored by the Stowe League of Women Voters.

Deadline Date: March 21, 1980. July 11 - August 5, 1980, "The Western Edge: Designer and Production Crafts," open to all California, Oregon, and Washington individuals and studios producing original designer and production crafts, for prospectus and further information write: Sharon Jeniye SCDC, 2627 Medlow Ave., Los Angeles, CA 90065.

Deadline Date: March 1, 1980, March 22 - 30, 1980. 9th Annual Crafts Exposition, 1980 Houston Festival. Contact: Houston Festival Crafts Exposition, Craft & Folk Arts Committee, 3815 Montrose, Suite 211, Houston, TX 77006.



THE ULTIMATE HOLY ROLLER

The Rolling Mill — spotted by Don Johnson at the Virginia Beach Boardwalk Art Show '79. Engraved rollers pressed pennies for 26 cents with either the "Lord's Prayer" or "Virginia Beach, VA." So much for its use, but isn't it a beauty!

BUILDING ARTS

This is a new funding category developed in response to growing activity in the visual arts field. It recognizes broadening aesthetic concern among visual artists for site and structure. It is designed to promote the integration of the arts in the construction of permanent buildings and their components. Grants in this category encourage craftsmen and artists to pursue new designs and experiment with materials, and techniques for building construction. These grants are awarded for research and planning, not for the actual construction of buildings.

I. Research grants enable craftsmen and artists to develop innovative uses of industrial materials and technology in the design of building components such as hardware, lighting fixtures, bathroom fixtures, tiles, windows, wall and floor surfaces. Projects also may outline new approaches to carpentry, masonry, laminating, sandblasting, pouring concrete, and other methods of building construction.

II. Planning grants enable craftsmen and artists to plan and design buildings and sites. Grantees may collaborate with architects, builders, or industry on specific building projects. Project examples include, but are not limited to, designs for:

—One of a kind hand-made houses
—Building components or architectural embellishments
—Ecologically provident shelters
—Structures that may have no use other than to enrich the landscape with fine forms. Such structures include towers, gazebos, pavillions, caves, columns, pedestals, pools, fountains, waterfalls, parks, plant forms, paved surfaces, fences, and walls.
—Lancscapes
—Restorations that require the use of historical tools and techniques.
—New buildings constructed with traditional techniques which preserve for our country crafts important in American history. Examples of such crafts include: adobe construction, stone-fitting and carving, timber joinery, blacksmith work, plaster work, cast metals, and building of log cabins, igloos and teepees. Floating and arboreal dwellings may also be included.

ELIGIBILITY—All visual artists.

GRANT AMOUNT—Research grants up to $5,000. Planning grants up to $5,000. Grants in this category do not require matching funds.

DEADLINE AND ANNOUNCEMENT DATES—Applications must be postmarked no later than January 2, 1980. Applicants should not anticipate notification of awards or rejections before June 1980. Projects should not be scheduled to begin before July 1980 and should be carried out during the succeeding 12 months.

APPLICATION PROCEDURE—For application and instructions write: Grants Office, Building Arts, Mail Stop 500, National Endowment for the Arts, 2401 E. St., N. W., Washington, DC 20506.

Please include with your application: 10 slides or other documentation of your recent work; an outline or description of your proposal; a list of anticipated expenses.

A project budget should include the costs for producing a visual record which will be filed with the Endowment upon completion of the proposed work. This record may be presented in its most useful form—slides, photographs, copies of drawings, films as well as written information. The intent is to preserve and make available through the library of the Arts Endowment a permanent record as a resource to the public.

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$205.00	$3.61	$5.13	$6.66
$210.00	$3.71	$5.27	$6.84
$215.00	$3.81	$5.41	$7.03
$220.00	$3.91	$5.55	$7.21
$225.00	$4.01	$5.69	$7.39
$230.00	$4.11	$5.84	$7.59
$235.00	$4.21	$5.99	$7.79
$240.00	$4.31	$6.14	$7.99

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PUBLICATIONS

A catalogue on Sheffield Plate available from the Indianapolis Museum of Art, 1200 W. 38th Street, Indianapolis, IN 46208, for $2.50. For domestic mailings up to 11 items, you may include your check with your order; postage and handling are: 1 item - $2.75; 2 to 4 items - $1.25; 5 to 10 items - $1.75. For orders of more than 10 items and for foreign mailings, postage is determined individually and included on the invoice.

SNAG EUROPEAN EXHIBITION CATALOG

The SNAG European Exhibition catalog is available from the SNAG Book Department, 4835 E. Cheryl Dr., Paradise Valley, AZ 85253. It is 48 pages and contains two full pages on each of the 39 metal artists. Each artist has a photo of the artist, a photo of a piece, a biography and statement. Cost is $10 for non-members and $5.50 for SNAG members. The usual 30% SNAG discount DOES NOT APPLY to this catalog, since it is built into the reduced price. Make check payable to SNAG Book Dept.

THE HAMMER

The Hammer is the official journal of the Amourers Guild of the Middle Kingdom and is published by its Guildmaster, Polidor Haraldsson (aka Brian Flax) with written contributions by the members and associates of the Guild. For further information on this publication write to: The Hammer, c/o Brian Flax, 6758 N. Sheridan, No. 245, Chicago, IL 60626.

THE CRAFTS REPORT

The Crafts Report, the news-monthly of marketing, management and money for crafts professionals. For subscription information, write: The Crafts Report, 700 Orange Street, Wilmington, DE 19801.

PLATINUM WORKSHOP SLIDES

A set of 25 color slides has been sent to Sandra Zilker as a contribution to the SNAG AV collection and may be borrowed and circulated. A set of slides may be ordered for purchase from Arline Fisch at San Diego State University, San Diego, CA 92182, for a cost of $15.00.

TECHNICAL PAPER BOOK

SNAG is now in the process of assembling a book that will contain all of the technical papers presented at past conferences. This book would be an excellent addition to any school or personal library and will sell for around $ 12. To reserve your copy and insure a sufficient number will be printed, write Tom Markusen, 17218 Roosevelt Highway, Kendall, NY 14476.

ART AND CRAFT HAZARDS INFORMATION AVAILABLE

The Art Hazards Information Center, a project of the Center for Occupational Hazards, will answer written and telephone inquiries on the hazards of arts and crafts materials and suitable precautions. The Information Center has a wide variety of written materials on these subjects for dissemination. For their publications list, enclose a self-addressed, stamped envelope. Write to AHIC, 5 Beekman Street, New York, NY 10038; telephone (212) 227-6220.

FILM ON HALLMARKING

The Worshipful Company of Goldsmiths has completely revised its prize-winning film on Hallmarking. For the past ten years the original film has been in constant demand from schools and colleges, film clubs and collectors both in this country and overseas. The re-make is called HALLMARKING OF GOLD, SILVER & PLATINUM, which runs for 18 minutes and was made in colour by British Films Limited.

It was filmed at the Assay Office in Goldsmiths' Hall (where over 14 million articles are tested each year) and explains the significance of hallmarks, as well as showing how individual articles are assayed and marked to maintain a six-and-a-half centuries tradition of consumer protection.

Prints of the 16mm colour film HALLMARKING OF GOLD, SILVER & PLATINUM will be available from October 1st, free of charge, from the Viscom Audio Visual Library at Park Hall Road Trading Estate, London SE21 8EL (01-670 6161), or direct from the Librarian at Goldsmiths' Hall.

TRUCK ON DOWN TO TUCSON

UPCOMING EVENTS

WORKSHOPS

The Revere Academy of Goldsmithing, 760 Market Street, Suite 937, San Francisco, CA 94102, will be offering the following courses beginning the week of February 4, 1980:

Pave Diamond Setting with Alan Revere; Jewelry Design and Rendering with Alan Revere; Jewelry Repair with Abrasha; Engraving with Ed Bienek; Enameling with Debra Fine-Yohai; Goldsmithing with Alan Revere; Design and Techniques in wax with George McLean.

CONFERENCES

January 20 - 26, 1980. January Seminars offered by the League of New Hampshire Craftsmen. Seminar 80 workshops will focus on two areas of interest to metalsmiths: Jewelry: Textile Structures Using Metal Foils — Arline Fisch; and Blacksmithing: Aesthetics for Iron — Chris Ray. For more information, contact: Evelyn Zimmerman, League of New Hampshire Craftsmen, 205 North Main Street, Concord, NH 03301.

March 20 - 22, 1980, SNAG Conference, Tucson, AZ. Write: Michael Croft, University of Arizona, Tucson, AZ 85721.

May 20, 1980, Jewelry — Metalsmithing European Tour. Paris, Idar-Oberstein, Pforzheim, Copenhagen, London. For preliminary itinerary, write: Frances Pickens, 1471 Kalaeipohaku St., Honolulu, HI 96816.

INTERNATIONAL DUTCH SILVER EXHIBITION

Dutch Silver: 1580-1830, an international exhibition of over 200 secular and religious objects of great aesthetic and historical importance, will open at the Rijksmuseum, Amsterdam, The Netherlands (December 1, 1979 - February 10, 1980).

In the United States it will be shown first at The Toledo Museum of Art, Toledo, Ohio (March 23 - April 20, 1980) and then at the Museum of Fine Arts, Boston, Massachusetts (May 13 - June 22, 1980). This is the first time that the Rijksmuseum has joined with American museums for a decorative arts exhibition and this is the first Dutch silver exhibition ever held in the United States. The exhibition was organized by an international committee of scholars at the instigation of The Toledo Museum of Art's director, Roger Mandle.

Tracing the development of Dutch silver from the late Renaissance to the early nineteenth century, these objects are among the most important creative expressions in Dutch decorative arts.

Highlights of the exhibition are a whimsical windmill cup of about 1580 from Leeuwarden and an exotic silver-gilt mounted nautilus shell from Utrecht of 1596. Seventeenth century objects include a large ewer and basin of 1613 by Paul van Vianen, which combines his masterful treatment of scenes in relief and the soft, organic masses of the auricular style; an extraordinarily designed and engraved dish of 1618 by Johannes Looff of Middleburg, and an intricately worked Hague toilet service of 1665.

Among silver from the eighteenth century will be a monumental Hague tea kettle with stand of 1707 and a tureen of 1780 by Johannes Schiotling, Amsterdam's most famous silversmith in the second half of the eighteenth century, while a caster, chestnut vase, and coffee pot, all by D. L. Bennewitz of Amsterdam, will be included in the group of silver from the early nineteenth century. Rare wedding caskets, brandy bowls, glass holders, missal covers and guild shields will also be represented.

A fully illustrated bilingual catalogue will be available. The exhibition has been partially supported by the National Endowment for the Arts, Washington, DC, a Federal agency, and the Federal Arts and Artifacts Indemnification Act.

GOLDSMITHING/SILVERSMITHING WORKSHOP
DENMARK, NORWAY, SWEDEN

June 20 – July 18, 1980
4 semester units

Studio study with Ellen Broker, Holst Andersen and Robert Coleman. Extensive field trips.

For free brochure contact:
International Travel Study, Continuing Education
San Jose State University
San Jose, CA 95192

Registration deadline: March 1, 1980!

EXHIBITIONS

Dutch Silver
Jacobus Carrenhof
Coffee pot with filter and stand, silver, ebony, 1818

Chapel Hill, NC "The Contemporary Jewelry of Mark Knipe" Nov. 3 - Dec. 24, Foree-Johnson Metalsmiths.

San Francisco, CA, Cloisonne Jewelry — Laura Popenoe: Gold Works — Glenda Queen, through Jan. 1, Union St. Goldsmith.

Washington, DC "Irena Brynner: Jewelry Since 1953" Sept. 28 - Jan. 13, Renwick Gallery, Smithsonian Institute.

Framingham, MA "Containers" Nov. 1 - Dec. 31, Danforth Museum.

"Silver in American Life," High Museum of Art, Atlanta, GA, Nov. 3 - Dec. 31; Amon Carter Museum, Ft. Worth, TX, Feb. 8 - April 13, 1980, Milwaukee Art Center, Milwaukee, WI, May 16 - June 20, 1980, Virginia Museum, Richmond, VA, Sept. 19 - Oct. 19, 1980.

New Haven, CT "Eleventh Annual Christmas Exhibit & Sale" Nov. 9 - Dec. 23, 80 Audubon Street.

The following exhibits will be held at Concepts in Carmel, CA: Edward De-Large — Nov. 16 - Dec. 30; Helen Shirk — April 14 - May 4, 1980; Lynda LaRoche and David Rodgers — May 30 - June 29, 1980; Wendy Ramshaw and David Watkins — Oct. 10 - Nov. 16.

Layton, NJ The Gallery Peters Valley presents "Sacred & Ceremonial" Nov. 17 - Dec. 24.

Peoria, IL "Faberge Show" Nov. - Jan. 1980.

Cookeville, TN, Appalachian Crafts/Thirteen States, Dec. 9 - Jan. 30, 1980, at Appalachian Center for Crafts.

Tucson, AZ, Tucson Museum of Art Features Silver, Gold and Glass, Jan. 19 - Mar. 9, 1980.

Soho, NY "2nd Holiday Invitational" Dec. 1 - Jan. 13, 1980, Spring Street Enamels Gallery, 171 Spring St.

St. Louis, MO "15th Anniversary Multi-Media Members" Dec. 2 - Jan. 2, Craft Alliance Gallery.

St. Louis, MO "Soft Objects & Enamels" Jan. 6 - 30, Craft Alliance Gallery.

Baltimore, MD "The Fourth Annual Winter Market of American Crafts" Feb. 16 - 17, 1980, New Baltimore Convention Center.

Dallas, TX "The First Annual Dallas Craft Market" open to trade April 10 - 11, 1980, open to public April 12 - 13, 1980, Market Hall in the Dallas Market Center.

Portland, OR "Holiday Festival" Nov. 30 - Dec. 24, Contemporary Crafts Gallery.

Toronto, CANADA "The Treasures of Tutankhamun" Nov. - Dec., Art Gallery of Ontario, only Canadian showing of this exhibition.

Cambridge, MA "Linda MacNeil — Glass Jewelry" April 20 - May 12, Ten Arrow Gallery.

EDITORIALS

Dear Editor:

Again and again, I as well as friends, come to the conclusion that this is the finest publication in its field because of its sophisticated content, but I wonder . . . why so many photographs appear that have been published in American Craft? Could not the artists and galleries submitting reviews to both publications send in different photos to each? Or if the same pieces are shown in several shows, why not choose unpublished pieces for their press releases? Since so many interesting pieces of jewelry and metalwork are produced, I see no need to print photos of works already published in books. I hope this is constructive criticism.

Ann Grundler

Editor's Note: We feel Ann has brought up an excellent point, one we too have contemplated and lamented. Our problem is that the same press releases and photographs are sent to many magazines. We usually have several pictures to select from and choose the ones we feel are the strongest visually. That they happen to be ones also selected by other publication is strictly chance (but denotes a shared base for determining quality).

Magazines make editorial and production decisions several months in advance of mailing dates (otherwise, they would never get all the work done). American Craft arrives approximately one month before the Journal; however, at that point your Goldsmiths Journal has just returned from the printer and is on its way to the labeling firm — obviously too late for any changes to be made. Because SNAG has not obtained a second class mailing permit and instead relies on bulk rate, your Journal may spend 3 - 5 weeks with the postal service before being delivered to your door. While we are on the subject of mailing, let us dipress for a moment. Bulk rate means 'bottom' priority — it only gets processed after all other mail has been taken care of. The Journal could (and does) sit at your local post office day after day simply because they are busy with other mail. Thus, if yours is a busy post office, you will habitually receive your Journal late, unless you sign up for 1st class postage. We are very sorry for this delay, but unfortunately it is completely out of our control. And one final note — bulk rate is not forwarded. That is why you must notify the Ohio Snag Office at least 6 weeks before moving to insure continuity of your Journal.

Dear Editor:

My writing is prompted by Dr. Kesselman's letter concerning his dealings with the Faber Gallery in New York. I sympathize with his situation and offer the following suggestions to fellow metalsmiths interested in protecting themselves.

First, doing the work is one thing, but marketing it is again something else. Do your marketing as carefully as you execute each piece. Just as you have found an approach to metal that works for you, you can find a way of marketing that suits your personality and goals. Whatever way is finally chosen - ASK QUESTIONS AND LISTEN.

Ask the gallery you are thinking of dealing with who they carry, location, terms of payment, etc. (or tell them yours - I do not consign except for one gallery and special shows). Then ask the craftspeople about the gallery. Read the letters in publications, taking note of who got stung and where. And remember . . . don't rely on appearances or 'prestige' — they can be most deceptive.

Finally, don't hesitate to tell what you know - both good and bad. Protection does not come from silence. We have nothing to gain and everything to lose by protecting a gallery or shop which engages in shaky business practices. I have just recently learned that American Craft Enterprises will check out buyers for you if you have a question. Either call or write: (914) 255-0039, Box 10, New Paltz, NY 12561.

Pat Garrett

Dear Editor:

I have mailed the following letter to The Committee on Wilson Indexes, American Library Association:

I have had many occasions to use your Art Index and always I have found them an interesting and valuable tool and reference. Recently, however, while doing some research it occurred to me that your Jewelry, Goldsmithing, Silversmithing, and Metals areas have always been weak. Being in that field, I know that much more has been happening than the Index suggests; more is being published in that area than ever before! I found that your Index of Periodicals excluded the Goldsmiths Journal, a bi-monthly publication devoted to this field published by the Society of North American Goldsmiths. It is the only professional journal devoted to this field in North America, covering news, artists, exhibitions here, as well as from many other parts of the world. I would strongly recommend that the Committee consider adding this publication to the Art Index collection of reference periodicals. I feel that it would be of great value and should not be overlooked.

I would like to know how the Committee makes its selection. If it is a matter of hearing from a number of other sources concerning this field, I would like to see that you do hear from people — before the Committee meets again.

Thank you for your consideration.

William Mickle

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Dear Editor:

I am writing to call the attention of the SNAG membership to the appearance of a new magazine called AURUM, the international technical review for jewelry manufacturers and goldsmiths. The pilot issue, dated March 1979, is available in English, as well as French, German, Italian and Spanish.

In a foreward by Dr. T. Groenewald, Manager of the Technical Advisory Service, he states the International Gold Corporation has established a Technical Advisory Service to assist the gold jewelry manufacturing industry at a technological level. Aurum is published by them "to provide a regular flow of helpful, interesting, and stimulating technical information to all who are engaged in the creation and production of gold jewelry."

"An attempt has been made to strike a balance between general and more specialized articles. The editorial content has been grouped into a few main categories such as gold metallurgy, processing or fabrication technology and methods, an educational series on basic technology for goldsmiths, international product news, and miscellaneous material of topical and general interest . . ."

The pilot issue is very attractive and informative. In my opinion, it would be a valuable reference to any jeweler. Subscriptions can be reserved by writing to the following address:

Aurum
P. O. Box 445
CH-1211 Geneva 1
Switzerland

The magazine will be a quarterly, and is edited by Dr. Parn Taimsalu. The next issue is scheduled for the fall.

Oppi Untracht

CALLING ALL MEMBERS

Dear Editor:

I am a novice metalsmith seeking to increase my knowledge and experience in the field. I am offering my services to an artist in need of any extra pair of hands, in exchange for room and board. I will be graduating in May and available thereafter — I will go anywhere in the U. S.

My experience consists of two semesters working with fine metal and a summer with a goldsmith working on his production line and managing his shop.

I could take more classes, but I am really looking for a one-on-one environment which I feel would be more beneficial to me. I am 21 years old, require little to be happy and am eager to learn by doing. Any response to this request would be greatly appreciated.

Eve Gard
40 Boy St.
Briston, CT 06010

Dear Editor:

I have often read Goldsmiths Journal with interest and lamented that there was not a similar British Publication.

This year I have been fortunate enough to receive the UK/USA Bicentennial Award and I will be working and living in the USA for 12 months.

I am particularly looking forward to contact with North American craftsmen and expect it to be a stimulating experience.

If you can assist me in this I would be extremely grateful. If I can be of any use to the Society of North American Goldsmiths, please do not hesitate to contact me at Concepts Gallery, P. O. Box 301, Carmel, CA 93921 (after December 1).

I look forward to hearing from you.

Edward de-Large

Dear Editor:

Ann Grundler's article in Goldsmiths Journal No. 26 (October '79) was of special interest to me since I'm considering metalsmith graduate studies/apprenticeship outside of the U. S. Could you or other SNAG members provide me with information relating to study in West Germany, i.e. which schools have the best gold/silversmithing programs and location, where I can write for details about these institutions.

If any SNAG members have studied in West Germany, I would appreciate any help you might give me, even if it's only names and addresses. Thank you!

Curtis Cassano
14 Dan's Court
Burlington, Vermont 05401

Dear Editor:

Tom Arnold's work in gold and jewels has come to my attention and I would like to know more about it and the artist. He seems to have been influenced by Faberge, as shown by two examples I have studied thus far.

Please telephone me collect at (608) 836-1551 if you have any information regarding Arnold or his work. I have made many inquiries, yet to date have discovered nothing.

Thank you.

Warren Gilson

Dear Editor:

I am preparing a book on Modern Pewter and am interested in picturing work from pewtersmiths all over the globe. If any SNAG members work in this field, please contact me — or send me the names and addresses of other you might know of. Hoping to hear from you soon.

H. A. Molenaar
Pewtersmith
F-06530 Le Tignet
Cote d'Azur, FRANCE

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ORNAMENT RESPONDS

Dear Editor:

Recently we received Goldsmiths Journal No. 26 and were rather disturbed to see Alan Revere's letter, without our having had a chance to print a rebuttal at the same time. We certainly do not object to critical letters about our journal, if they are accurate, but Mr. Revere has not completely stated the facts in his letter.

While it is true that there was a long interval between receipt of his check and the first issue of Ornament, Mr. Revere was sent the last double-issue of The Bead Journal during that interval, as were all other subscribers. Thus of the $12, he paid for 4 issues, the equivalent of 3 issues had already been received at the time he wrote. In September he was refunded the price of the remaining issue of his subscription.

We are a small journal with a staff of 2, and essentially keep the journal going by taking personal loans. There is no support system besides ourselves. In both volume 3 (3/4) and 4 (1), we told our readers in an Apologia and Editorial or our publication problems. At no time have we deceived our readers about our precarious state, and the majority of the readers are understanding and supportive.

As to his criticism: "I received the issue, and have not heard from them since, except seeing the myriad advertisements placed in several other magazines." With our limited staff, most of the time is occupied with editorial, production and business aspects of the magazine; frankly, we are often behind on our correspondence. But in order for a magazine to survive, it has to advertise. It is a fundamental necessity. No other magazine is publishing on aspects of ancient, ethnic and contemporary jewelry in the serious manner as Ornament (formerly The Bead Journal) has already done in the issues printed.

Robert K. Liu, Editor
Carolyn L. E. Benesh,
Associate Editor

Dear Members:

After learning of The Metropolitan Museum's acquisition of Marilyn Davidson's brooch and Michael Jerry's cooking pot, we wrote to Penelope Hunter-Stiebel (Assistant Curator, European Sculpture and Decorative Arts) at the Metropolitan, asking for some text to accompany the photographs.

What we received in reply was a letter which stated in part " . . . that I selected and recommended them as additions to the permanent collection of the Metropolitan Museum of Art, I think speaks for itself. I am most grateful to the artists for donating these works since there are no museum funds available to me for purchase in this field . . . "

We found this disturbing on two accounts: (1) the lack of interest on the part of the Metropolitan in discussing its acquisition and (2) the fact there are no monies available for works 'in this field.' In talking with a friend fiber artist, I learned the Metropolitan had also recently acquired one of his works — only with cash, not verbal thanks. Should we in the metals field sit back and accept this? Is our field not equally important? Should we resign ourselves to a lifetime of donations in order to have works in prestigious museums?

We would like to hear your responses — both pro and con — on this issue.

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Dear Editor:

This is in reply to Linda Barba's questions concerning gold alloys published in the August 1979 Goldsmiths Journal.

Don't let the term 'Methylated Spirits' get you down. When I went to school, many, many years ago it meant alcohol. The practice of quenching gold is limited by the specific alloy used. A side benefit of such quenching is that the metal is nicely cleaned.

Getting to the business of literature on the subject of gold alloys, there is not much around that really explains the nitty gritty. For example, for years I've seen the terms, blue gold and purple gold described and their formulas given. But has anyone ever described how the ingredients are alloyed? Not that I've seen. I could describe the most careful attempts at alloying for blue gold in an oxygen free atmosphere and winding up with a button of pure iron, enveloped in pure gold.

For your purpose, the book, Working in Precious Metals, by Ernest A. Smith is the best I've seen. It is published by N.A.G. Press Ltd. London, England, and is obtainable from: The Worshipful Company of Goldsmiths, Goldsmiths Hall, Foster Lane, London, EC2V 6 BN, England, You might inquire of the SNAG book club before writing to England.

Tables of weights of different karats of gold are, at best, approximations since the specific gravities of differing alloys of the same karat can vary in weight. You are correct in your observation that books on jewelry do not generally give the weights of 20, 22 or 24k gold. However, in Metalwork and Enameling, by Herbert Maryon, there is a table, "Weights and Specific Gravity of Metals" which gives the comparative weights of 6, 9, 12, 15, 18, 20, 22 and 24 karat golds. From these figures you can compute the weights per square inch and wire per foot for given thicknesses of these alloys.

In Jewelers and Watchmakers Pocket Book by A. Selwyn, specific gravity tables for 9, 14, 18, 22 and 24 karat golds are listed. To find the S. G. for 20k from Selwyn's book you could approximate it by interpolation. I hope your math is up to that.

Handy and Harman's, The Handy Book for Manufacturers, is also a valuable booklet for the jeweler. From it, you can determine the approximate specific gravity of any jewelry alloy. It is interesting to note that in the three publications mentioned, there is variation in the S. G.'s of the various golds.

I am sure you have good reasons for wanting to alloy your own golds but modern producers of gold alloys can save you a lot of work. Playing around with gold at its present astronomical price, unless you're looking for some specific esoteric combinations, may be less than practical. Good luck.

Nathan B. Winkler

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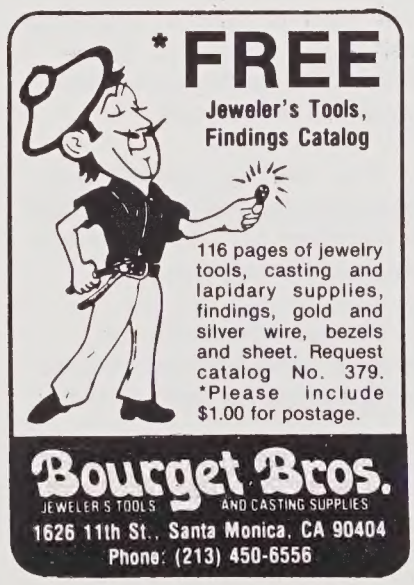
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TECHNICAL INFORMATION

GOLD REFINING

by Roland Loewen

Valuable scrap occurs in several broad classes of material:

1. Hi-grade scrap such as jewelry and "old gold," bench sweeps, strip tank sludge and similar material. It usually contains from 20% to more than 50% gold.
2. Dust collector vacuum cleaner sweeps, floor sweepings, wiping rags, used polishing buffs and brushes, jewelry shop carpets and flooring, etc. This material is burned slowly and carefully in closed furnaces to avoid loss of gold and to prevent air pollution. The ashes are usually in the 2% to 5% gold content range.
3. Plated material, jewelry, electronic, etc.
4. Rolled gold or gold filled material.
5. Plating solutions.
6. Dental scrap - usually hi-grade but listed separately as it often contains platinum and palladium.

Gold refining may be done in a number of ways. Each method has its advantages and its disadvantages. Although the chemistry of gold is comparatively simple (it does not easily form chemical compounds), there is very little written in the form of straight-forward descriptions or directions for gold refining. Furthermore for purposes of security and probably secrecy it is not easy to visit and tour a refinery. However, the following are outlines of some refining methods.

1. Chlorination whereby chlorine gas is bubbled through molten but impure gold. This is largely used by gold mining companies. It works better with fairly large batches. It has the disadvantage of using unpleasant and toxic gases.
2. Electrolytic refining is now probably most used by secondary refiners. In general the commercial refiner takes the scrap sent to his shop and treats it in a way to provide a reliable sample which is assayed and is the basis for settlement.

In the case of scrap listed as 1 and 6 above, this would be a matter of melting in a crucible with suitable flux. The metallic portion sinks out and after pouring and cooling the slag is broken away. The metal is weighed, sampled and assayed to determine value.

Low grade scrap (2 above) is burned, the ashes milled in a ball mill, weighed, sampled and assayed to determine value.

The ashes are later mixed with fluxes and the ashes melted to allow the metal to settle out. The melt is lengthy, requiring half a day or more. Some shops add rolled and filled scrap (4) to this melt.

The melt is poured and when the pour is cool the slag is knocked off and the metal retained for refining.

Plated material (3) and plating solutions (5) require special steps for gold recovery.

The metal from the several sources is remelted and cast into anodes. It may be necessary to add silver to this metal to provide a suitable anode.

These anodes are placed in a "silver" cell in a suitable cloth bag. The cell contains a nitric acid-silver nitrate solution. Direct current electricity causes silver and alloying elements such as copper, nickel, etc. to go into solution. Gold and most platinum metals will not dissolve in nitric acid. These fall into the bottom of the cloth bag.

The silver is plated onto the cathode. By careful control of the solution copper and nickel, etc. stay in solution. However, the solution must be regularly changed to keep this control.

The sludge of gold and platinum metals in the anode bags is removed. It may be treated chemically to remove the small amount of silver that usually follows the gold.

This sludge is melted and poured into anodes which are placed in the "gold" cell. This cell contains a solution of gold chloride and perhaps a little excess hydrochloric acid.

When direct current is passed through this electrolytic cell, the gold first dissolves and is then plated out on the pure gold foil anode.

Silver is insoluble in chloride solution and falls out as a sludge. Platinum group metals (if any) are later recovered from the solution and from the sludge.

When run under proper control a high purity gold is produced. Toxic and acid fumes are nonexistent or very few. The entire procedure is good for fairly large quantities of material. A good operator can blend the various scrap to obtain optinum recoveries and costs.

Disadvantages are that considerable gold is tied up in process at any one time. Small lots of scrap cannot be easily processed alone but must be sampled, assayed and then comingled for refining.

Electrolytic methods were invented in the late 1800's.

3. Aqua regia refining goes back to antiquity. It has some inherent advantages as well as its own set of problems. Of greatest interest to jewelers is the refining of fairly high grade bench sweeps, "old gold" and scrap jewelry. The scrap material is normally burned with a little lighter fluid to get rid of paper, etc. Iron is removed with a magnet.

The scrap is placed in a glass container and aqua regia is added. Aqua regia consists of 4 parts hydrochloric acid and 1 part by volume of commercial nitric acid. This mixture slowly (for a day or two) emits chlorine gas.

The aqua regia is added (usually quite slowly) to the batch of scrap. The aqua regia is kept hot (nearly boiling). The reaction with the scrap produces gold chloride, copper chloride, nickel chloride, etc., all of which are quite soluble. It also produces copious brown

nitrogen oxide fumes that are very acid and somewhat toxic.

When the digestion is complete (after a few hours or sometimes after a few days) the solution is cooled and filtered through paper or a suitable chemical filter and the filter is washed.

The undesirable insoluble material like pumice, sand from sandpaper, etc. is now in the filter and the soluble metal chlorides in solution. The solution also has some excess aqua regia. We always add a little excess to be sure all gold is dissolved.

The excess aqua regia (especially the nitric acid) is removed by extended boiling or by chemical methods.

This chloride solution is then treated with a chemical that precipitates out the gold as a gold powder and leaves the copper, nickel, iron and other metals still dissolved as chlorides. Gold precipitates easily and many chemicals will do the job. Copperas (ferrous sulfate in modern terms) is the classic material used. Sulfur dioxide gas works well.

When tests show the precipitation is complete, the gold powder is filtered out, washed with dilute hydrochloric acid and water. The gold powder is then melted and cast into bars or shot.

The disadvantages of the aqua regia method are largely the corrosive and toxic nature of the chemicals and fumes.

The advantages are that the process is rather fast and a shop can return scrap to production in a few days.

A small refiner can keep each client's material separate and can return the recovery or money and report results quite rapidly, usually in about one week.

Silver is not soluble in hydrochloric acid. However, it is slightly soluble in strong aqua regia, especially hot. However, by filtering cold, it has been my experience that gold refined by this method will assay better than 999.

A sometimes advantage too is that diamonds, rubies, and emeralds in scrap or out moded jewelry can be recovered during refining without the danger of breakage that often occurs in hand break out.

4. Some small shops do so called "refining" using nitric acid only. The method consists of melting the scrap with silver or usually copper so that the molten product is only about 20% gold, the remainder being base metals.

This is shotted and digested in nitric acid which in theory dissolves all metals excelt gold. The "gold" that remains is then filtered off, melted and used. As a matter of fact the gold holds some of the base metals so intimately that a clean separation is not possible.

The resulting product is reported to be in the low 90% range in some cases and is often quite variable from batch to batch.

This method, known as "parting" is useful in some steps of refining and assaying but is not considered reliable as a complete refining method.

5. Cyanide solutions are used by some gold mines to recover gold from ore. It is used for some specific materials by refiners but works rather slowly — is not really a refining procedure.
6. Recently ion exchange methods have been investigated and are now in use for some recovery work especially for gold plating solutions. It is not a complete refining procedure.
7. So-called "Fire Refining" is an old method involving various fluxes. "Cupelling" is the name for a method involving lead and lead oxide. It is a step in some of the refining processes.

I will be glad to discuss refining in more detail.

I do refining as "ALCHEMY."

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Roland Loewen
117 North Holly Drive
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TECHNICAL NOTES ON PLATINUM

Platinum Jewelry Workshop
San Diego State University
July 1979

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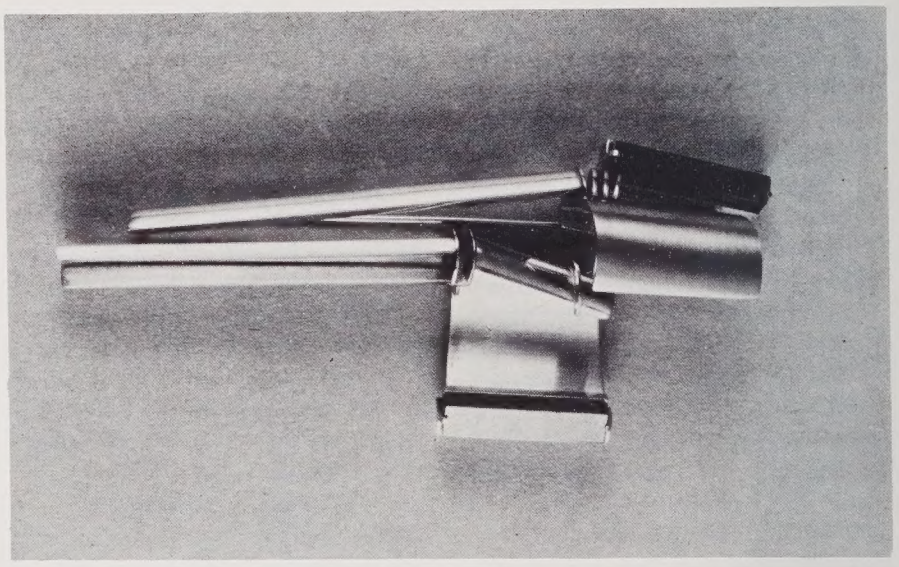


Helen Shirk
Two Brooches, platinum, 14k gold, jade

Editor's Note: This project was funded by a grant from the National Endowment for the Arts in cooperation with San Diego State University Foundation and Matthey Bishop, Inc. of Malvern, Pennsylvania.

This document was compiled from notes and observations made by the participants in the Platinum Jewelry Workshop, which was directed by Arline Fisch.

Participating Artists: Arline Fisch, Gary Griffin, Jane Groover, David Keens, Leslie Leupp, Marcia Lewis, Dieter Muller-Stach, Gary Nemchock, Eugene Pijanowski, Hiroko Pijanowski, Vickie Sedman, Helen Shirk, and Fred Woell.

GENERAL CHARACTERISTICS OF PLATINUM

Working in platinum is more different than it is difficult. In some aspects such as weight, hardness and thermal conductivity its differences are very pronounced and require somewhat drastic changes in procedures; in other aspects such as ductility, strength and malleability the differences are slight and always on the positive side with little or no compensation required.

Certain characteristics of platinum need to be taken into account when designing and executing a piece. It is a very dense metal with a specific weight of 21.45 (20.70 for platinum/5% ruthenium). This means that much thinner gauges of platinum need to be used in order to achieve the same weight as other precious metals. It is also a very strong material which is capable of maintaining structural strength and rigidity in thin gauges and small cross-sections.

Two factors which seriously affect working procedures in fabrication and in casting are the low thermal conductivity and the very high surface resistance of platinum. A third factor which specifically affects casting procedures is the extremely high melting point of the metal. The low thermal conductivity and the high melting point combine to require soldering and welding procedures which are very different from those normally used by jewelers and metalsmiths. The surface resistance makes platinum difficult to polish unless very specific procedures are followed.

Procedures for working in platinum are discussed under specific subject categories below:

FUSION/WELDING

Joining parts by fusion can be done very successfully with platinum. The metal does not oxidize when heated so there is no interference with a welded joint and no pickling is required after welding. The low thermal conductivity of the platinum allows for accurate control of heat and a clean fusion of small joints. A close fit is essential for a good weld with a minimum of distortion. Heat is applied directly and quickly with a small and intense flame. When the joint reaches the melting point platinum flows readily, producing a smooth and shiny joint. The flame must be removed immediately.

Small chips of pure platinum can be used like solder to help in producing a fused joint. The extra platinum flows at the same time as the joint and fills in any slight gap or low area, much like fill rod used in welding.

Platinum wires of small diameter can be readily fused together at the ends, forming shiny round beads where the wire tips touch. Wires as small as 30 gauge can be welded if a small enough flame is used.

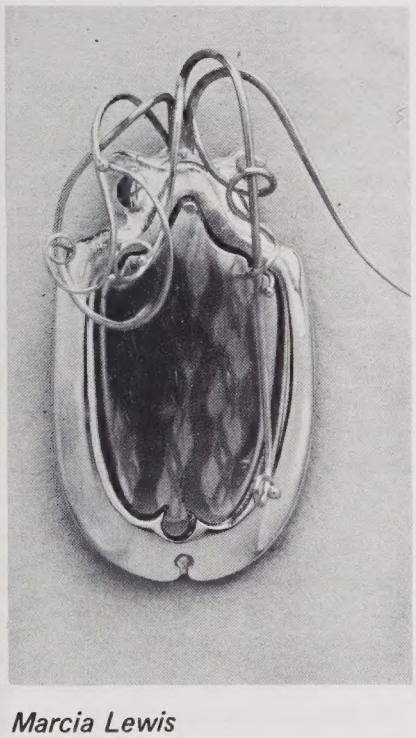
Torch tips recommended for welding: #25 and #32 with a MECO torch. Stainless hypodermic needles can be silver soldered to a spare torch tip to make an even smaller flame. (The size of the orifice is stamped on the side of the hypodermic needle.)

For all small flames an oxygen regulator with a low end capacity should be used to maintain one to two pounds of pressure without fluctuation.

Propane gas could be used in place of natural gas on most gas/oxygen torches (check specifications) to make a hotter, cleaner and more portable heat source.

CONTAMINATION

Platinum is readily contaminated by other metals when it is heated. It is important, therefore, to use clean tools which will not leave a residue or particles of other metal on the platinum. Because of extreme differences in melting points other metals tend to sink into the surface of platinum as it is heated for annealing or soldering, causing both pits and discoloration of the surface. Once another metal is alloyed into the platinum it is impossible to remove except by refining.



Marcia Lewis
Brooch, platinum, gold, silver, copper

A somewhat less drastic form of contamination occurs from the use of tweezers, clamps, pins and binding wire as holding or fastening devices for soldering. If steel, iron, chrome or nickel-plated elements are within the high heat area required to flow platinum solder they produce a blackish stain on the metal. If they are actually in contact with the joint total contamination through fusion may result, for which there is no salvation. The staining is a less serious form of contamination and can usually be removed by heavy abrasion. It is best to avoid this problem by placing any such holding devices sufficiently far away from the actual heat area (at least ½" away from the tip of the flame).

SOLDERING

Platinum can be soldered with a variety of solders which flow at different temperatures. Platinum in its pure state can be used to form a welded joint at 1740C; platinum solders are available in 1700, 1600, 1500, 1400, 1300, 1200, 1100, and 1000 number designations which correspond roughly to the flow points in centigrade measurements. In addition, platinum can be soldered with lower temperature silver and gold solders although this is not recommended except when joining platinum to other metals which cannot tolerate the high heat of platinum solders.

Flux is not necessary for any solders under 1300 since platinum does not oxidize. However, a liquid flux such as Battern's is helpful in placing solder chips and holding them in position during heating. It is important to use the flux sparingly and to dry it slowly to prevent displacement of the solder.

It is difficult to solder without a perfectly fitted joint. The two pieces to be joined must be in contact with each other for the solder to flow properly. Platinum solder does not fill gaps by flowing from one piece to another. If the solder flows onto one piece there should be no attempt to reheat without applying a new piece of solder. Time and care should be taken to ensure a close fit prior to soldering.

Small solder joints are best made by holding the entire piece in the air with a cross-lock tweezer, allowing the heat to be placed directly on the joint. If a flat surface is needed for support, an alumina oxide block should be used for maximum heat reflection. A charcoal block may also be used.

Longer solder seams are best accomplished by tack soldering first in the center of the seam, then soldering the length of the seam one piece of solder at a time.

Solder is generally supplied in sheet form. It should be rolled down to as thin a gauge as possible (.005 or less) and then cut with a small shears into very tiny paillons. Platinum solder is best used in very small pieces placed close together along the joint. No attempt should be made to "pull" the solder along a seam; the low thermal conductivity of the metal makes it necessary to spot heat small areas at a time and to move the torch down the length of a seam 1/8th of an inch at a time. A delicately pointed pair of soldering tweezers is helpful for placing solder (AA stainless are recommended.)

Eye protection is essential during soldering operations because of the light intensity of the flame. Ordinary dark glasses are not sufficient, and cobalt lenses are inadequate because they allow ultraviolet rays through. A welding glass filter of #4 or #5 density is required for total protection. This can be in the form of protective glasses, welding goggles, or a lens suspended in front of the soldering area.

Small tips (#25, #32, #40) are used in soldering to provide a shart, direct and intense flame. Heat dispersion tips are not recommended since soldering does not occur by conduction but, rather, by quick and direct application of heat. It is not necessary to heat the area to be soldered slowly (except to dry the flux if that has not been done before). Instead, the flame is placed directly on the joint, or on one section of a long seam, and held steady until the solder flows. Warping is caused by heating too broad an area at one time; quick and direct heat with a small flame keeps distortion to a minimum. If the flame is positioned correctly, and the joint is well fitted, soldering will occur very rapidly. It can be seen as a shiny flow. The flame should be taken away immediately to avoid discoloration of the solder through overheating. Platinum solders do not pit when reheated but they do turn a dark gray color when heated beyond the flow point. The lower temperature solder also deteriorates with repeated heatings.

Since platinum does not oxidize when heated, all parts can be completely finished and polished before being assembled by soldering. This is a decided advantage in complex assemblies providing that correct amounts of solder are used and no clean-up is required on the joints and seams.

The positioning of pieces for soldering can be a difficult problem because of the possibility of contamination from tweezers or iron binding wire.

Any holding devices must be placed sufficiently far away from the heat area to avoid contamination. Props can be made of charcoal, or of other pieces of platinum; cages and slings can be made of binding wire to support pieces at the correct angle. Steel pokers cannot be used to reposition pieces during soldering, or to move solder into a joint. If a poker is necessary it must be made of tungsten carbide.

If multiple solders are used they should be in diminishing order: 1700, 1600, 1500, etc. However, it is possible to make multiple joints, even in close proximity, with only one grade of solder because of the low thermal conductivity of the metal. Experience seemed to indicate that 1400 solder is preferable for long joints on thin gauge material; 1500 solder is good for most basic sheet fabrication; 1600 is excellent for wire fabrication; 1700 and pure platinum are good for weld joints in both wire and sheet. If only one solder is to be used, 1400 is recommended for most general fabrication.

It is not necessary to pickle following solder operations since there is no flux and no oxidation to remove.

ANNEALING

Annealing requires a two stage heating of the metal — the first to relieve stress, the second to soften. A large, bushy, blue oxidizing flame is needed so a dispersion tip must be used (#3, #5, #7, etc. depending upon the size of the material being annealed). The metal must be placed on an absolutely clean and heat reflective surface. An alumina oxide or a charcoal block should be reserved especially for this procedure.

Stress is relieved at approximately the same temperature at which silver is annealed (1100F) so the color of the metal is the same cherry red. It is best to stress relieve for a few minutes before proceeding to annealing temperature. Annealing occurs at slightly above 1800F when the metal is a very bright orange color. It should be held at this temperature for a minimum of 30 seconds to ensure softening, the length of time determined by the size and thickness of the piece. Be sure to use protective lenses.

The color fades almost immediately upon removal of the flame. The metal may be air cooled or quenched in water.

Since annealing only occurs when metal is held at the appropriate temperature for a period of time, it is possible to solder platinum without annealing. This means that tempered elements such as pin stems and springs may be soldered in place.

FORGING

Platinum is a very malleable material which forges easily. It is necessary to deliver deliberate and forceful blows, especially when working with large cross sections. There appears to be a change in the surface after the first hammer blows; small surface cracks and streaks of discoloration develop but these do not deepen or present any further problem. Some small flaking occurs as forging progresses but causes no damage. The metal can actually be folded over itself and compressed by hammering without cracks appearing.

In tapering, a square cross section is desirable until the final length is achieved. This is somewhat difficult to maintain. Careful attention must be paid to maintaining a square cross-section as the material tends to form an oblique or a parallelogram instead.

The response of the material in terms of directional movement caused by hammering is comparable to forging other metals. Once the final length is achieved a round cross section can be made by a combination of planishing and filing.

Annealing periodically is necessary, but only about half as often as sterling silver. It is recommended that annealing should follow each 30% reduction in cross sectional area. Non-annealed wire will cause dents in cast stakes, and will mar hammer surfaces; annealed metal has no such effect.

It was found that not only does platinum forge very well but that the process can be used effectively on small scale material to produce strong and rigid elements of great delicacy.

FOLDING

Folding is a way of giving structural strength to thin sheet metal. It seems a desirable approach to platinum because of its weight and its basic strength.

Sheet of any thickness is rolled down to 35 gauge (.005), annealing periodically as required. The sheet is not annealed after the final roll or two because work-hardened material will allow for crisper folds. Folding can be done directly with a pair of pliers, either flat or needle nose. Consideration must be given to the relationship of the design, the thickness of the metal and the structural strength of the finished piece. Thinner gauge sheet will demand more folds and fewer large open areas than heavier metal. However, heavier metal will not produce crisp folds unless the metal is scored deeply first, thus reducing the directness of the work process.

Side walls can be soldered on using the same or slightly heavier gauge sheet. 1400 solder cut into very small pieces and placed along the entire seam flows easily and produces an excellent joint. Thin gauge metals heat much more quickly and are readily soldered using a #25 or a #32 tip with 2-4 lbs. of oxygen pressure.

Thin metals are difficult to saw without damaging the surface. It is advisable instead to cut with hand or bench shears. This is also less wasteful of the metal.

CHASING

Chasing in platinum can be done in thinner gauges than are normally used in other metals because of the superior strength of the material. 26 gauge platinum seems to work in much the same manner as 22 gauge sterling silver and still retains sufficient rigidity to support quite highly embossed relief surfaces.

The metal should be annealed before chasing is begun. Interim annealing does not seem to be necessary unless the metal has to be moved drastically within a small area. For example, fatigue and ripping of the metal were experienced in an area of 26 gauge which had been raised ½" and then repeatedly pushed back ¼". Pitch can be cleaned off the surface easily by first coating with a thin layer of oil, heating lightly with a gas/air torch, and wiping clean with a soft cloth or paper towel. A solvent such as lacquer thinner can also be used.

Since the metal is quite tough and strong, it is advisable to put a matt texture on the chasing tools to keep them from slipping as the hammer blows are applied. This texture is easily made by slapping the surface of the tool lightly with a coarse file. It will have to be replaced periodically because it is worn down rapidly by the surface of the platinum.

It is difficult to chase an even-textured surface on platinum. After chasing, the surface can be scraped with a tungsten carbide scraper, smoothed with abrasive papers and a scotch stone and burnished with a tungsten carbide burnisher to achieve a polished surface. The marks of the chasing tools may be left to achieve a textured surface but it will not be as consistent as a similar surface on silver or gold.

SURFACE ORNAMENTATION

Japanese Line Inlay (Sen Zogan)

Normally the base metal for this type of chisel-cut inlay is 2 gauges thicker than the wire to be inlaid. However, with platinum it is possible to use the same gauge, e. g., to inlay 20 gauge round wire into 20 gauge sheet. Platinum chisels well even though it is a dense and hard material. It is similar to sterling silver in the way it cuts, but with a bit more resistance. There is no difficulty in making the necessary dovetail cut and the raised burr along the edge of the cut. The wire to be inlaid should be very soft (pure gold, pure silver, copper) and in a totally annealed state. The sheet must be supported in pitch while the inlay is hammered into place. The surface is finished with files, abrasive papers and buffing compounds in the same manner as other precious metals.

Damascene (Nunome Zogan)

Very thin gauges of sheet metal can be used for this technique. Any metal may be used as the base (steel, iron, copper, gold, platinum, etc.) and any soft metal can be used as the inlay (pure gold, fine silver, copper, aluminum) as long as it is rolled down to foil thickness (.005" and less). Platinum of 28 gauge can be inlaid with any of the soft metal foils by texturing the surface of the platinum with a flat edged chisel. The platinum is supported in pitch during the damascene process. The foil is pressed into the textured area with light hammer blows using wood and steel punches.

Note: Colored aluminum foils can be purchased from a florist.

Twisted Wire Lamination

Wires of different metals but similar gauge round cross section are twisted together, e. g., platinum, 14k gold, fine silver, 18k gold (24k is too soft and totally engulfs the harder platinum). Platinum wire must be annealed before twisting. Twisted elements can be annealed later but platinum requires too high a temperature and will not soften at the same time as the other metals. Put the twisted element through the rolling mill several times, or hammer flat to reduce spaces and gaps between the wires. Cut backing plate into desired shape — use fine silver or any other metal to support the wire pattern. Since it is only a support, platinum is unnecessary and adds too much weight.

Medium silver solder sheet is cut into the exact shape of the backing plate, annealed, air cooled and pickled. The solder must be completely flat and thoroughly clean. The solder is placed on top of the backing sheet; the twisted wire elements are arranged in the planned pattern and flux coats all elements. Heat is applied slowly around the edge of the piece and then moved slowly to the top; it is held there until the solder flows up between the wires. The piece is pickled, rinsed, dried and then rolled through the mill until the surface is totally flat.

Etching

The recommended etchant for platinum is Aquaregia, a mixture of one part nitric acid and to three parts hydrochloric acid. This did not etch the platinum before breaking down the asphaltum and lacquer resists. The Research Center at Matthey Bishop suggests using reverse electrical current, a type of stripping action. However, since platinum is noted for being immune to body chemicals, etching is not the best technique to use with this metal. Sandblasting an annealed surface might produce similar effects to etching.

Roller Printing

Annealed sheet metal produces an impression very similar to sterling silver. Non-annealed platinum results in only a very light impression.

Impressions of good clarity can be made with steel and copper wire mesh, photoetched brass and copper pattern plates, pierced brass sheet, and almost any type of metal template or texture. Softer materials are not recommended.

Granulation

It is difficult to make spheres of platinum despite the fact that platinum wires bead very well. The small spheres seem too heavy to support themselves when molten and tend to distort by collapsing on themselves. The fusion quality of platinum suggests that granulation is possible. However, there does not seem to be a point at which adhesion takes place before the spheres fuse totally into the base, distorting their shape even further.

Experiments with this technique were not successful.

CASTING

The very high melting point of platinum (slightly over 3200 degrees F) raises several problems not faced in the casting of other precious metals. Equipment, investment and procedures are all slightly different but essential to successful casting in platinum.

A torch capable of melting metal at 3200 degrees F is required. Oxy-acetylene can be used, as can natural gas/oxygen providing a tip is used which produces a long and sharp blue flame. Prestolite is not adequate to reach the necessary temperature. The best mixture is hydrogen/oxygen since it produces a very hot and clean flame.

Since platinum cools rapidly a high torque casting machine is essential. A vertical arm "Torit" casting machine is recommended. A motor driven horizontal machine capable of delivering a high torque very quickly is also effective.

An Alumina Oxide crucible must be used because of the high temperatures required. Platinum must be thrown into the mold at 3250 degrees F, nearly double the casting temperature of silver.

A special high density, extra strength investment is necessary to withstand the heat of molten platinum and the impact of the heavy metal in the mold cavity. Most platinum investments require a setting agent called an accelerator. Kerr Platinite is an investment recommended for platinum and steel which does not require an accelerator.

Investment Procedures

Platinite is very different from most other investment materials used for precious metals. Procedures for its use must be followed very carefully and accurately or it will not set properly.

The investment powder is mixed into the water very slowly, one teaspoonful at a time, in a proportion of 38 parts water to 100 parts powder. The water must be mixed continuously with a heavy duty electric mixer at slow speed while the powder is added.

The investment is thoroughly mixed for an additional 15 minutes at slow or medium speed.

The investment must be held at full vacuum for a full two minutes while still in the mixing bowl. It is poured into the flask and vacuumed again for 1½ minutes at full vacuum. The flask is then topped off with an additional 1" of investment beyond the top of the flask (use a paper collar as a retainer).

It is important that the wax being cast is positioned correctly in the flask. There must be a minimum of 1" of investment on top of the model, and at least ½" from the sides of the model to the inner diameter of the flask. A lining of 1/8" sheet asbestos should be placed inside the flask before investment is poured, and the sprue base coated with Vaseline to permit easy release.

Platinite takes more than three hours to set up. At that time excess water on the top of the flask should be poured off. Water should be poured off periodically until investment is dry.

Investment should sit at least 12 hours before burnout.

Burnout Procedure

The burnout is long (10 hours) and must be conducted carefully.

Step 1

Preheat the kiln to 200 degrees F, place flask in for two full hours at 200 degrees F. Do not rush this step. During this period all moisture is slowly removed from the flask. If it is not thoroughly dry, the investment may fracture and the surface of the casting will be spoiled.

Step 2

Raise temperature to 300 degrees F for one hour.

Step 3

Raise temperature to 400 degrees F for one hour.

Step 4

Raise furnace temperature by 200 degrees F every hour until 1400 - 1600 degrees F has been reached.

Step 5

Raise temperature of the flask to desired casting temperature. If the piece is heavy in cross-section and simple in design, 1400 degrees F is adequate; if thin in cross-section and/or complex in detail, then 1600 degrees F will be necessary.

Heating and Melting of Metal

An Alumina Oxide crucible must be used to withstand the high melting temperature of platinum. A new crucible should be lightly glazed with Borax before using in order to close off pores in the surface which might trap metal. The metal does not combine easily and only when it is fully molten does it form a single mass. A stirrer cannot be used unless it is of tungsten carbide — all other materials will melt and combine with the platinum.

No flux is used because platinum does not oxidize.

The torch flame should be long, blue and slightly bushy. The preferred heat source is hydrogen/oxygen or natural gas/oxygen.

KERR PLATINITE INVESTMENT

Without Quickset Accelerator — Directions

PREPARE FLASK FOR INVESTING

Line the flask with dry asbestos strip at least 1/8" thick so that inside of flask is covered within 1/2" of top and bottom. For larger flasks (6" diameter or more) it may be necessary to use a 1/4" thickness of asbestos. Dip lined flask into water and press asbestos to sides of flask.

Place a collar around the top of flask to extend about 2 1/2" above flask. Ordinary gummed tape 3" wide or rubber collar may be used for this purpose.

WARNING! There must be a space of at least 1/2" between the patterns and the asbestos at the sides of the flask and preferably a space of at least 1" between the top of the patterns and the top of the flask.

Place the flask on sprue base holding mounted wax patterns.

NOTE: If the sprue base is metal, it should be covered with a thin layer of wax or petroleum jelly to make easy separation from the investment possible. If the base is rubber, use petroleum jelly.

MIX THE INVESTMENT

Measure the Water and Powder — 36-38 parts Water/ 100 parts Powder.

Place the water in mixing bowl of the mixer and start mixing at low to medium speed. Always add the Investment Powder to the water SLOWLY. For example, allow three to four minutes in adding 4 lbs. of Investment.

Mix until the resultant slurry consistency is creamy thin.

NOTE: A mixing time of 15 minutes is recommended. Setting time of the Investment is not rapid. More than one flask can be invested from a single mix.

VACUUM

Vacuum the slurry in the bowl for 1 - 2 minutes at FULL VACUUM.

Fill the flask up to the collar and repeat vacuum step. Vacuum the invested flask for 1 1/2 minutes at FULL VACUUM (approximately 2 1/4 minutes in total).

Add sufficient Investment to fill the collar about 1" above the flask.

SETTING TIME

Let the invested flask stand, undisturbed, in dry warm room for three hours.

Pour off excess water. Continue this procedure until top of flask is hard and dry. Remove the collar, carefully trim excess Investment flat and flush to the flask level.

Allow the flask to stand overnight before proceeding to burnout.

BURNOUT PROCEDURE

Place the flask sprue end down in a furnace preheated to 200 degrees F and leave the flask for two hours at this temperature (until flask is free of moisture).

Raise furnace temperature to 300 degrees F for one hour.

Raise furnace temperature to 400 degrees F for one hour.

Raise furnace temperature to 200 degrees F per hour until 1400 degrees F - 1600 degrees F has been reached.

Raise temperature of the flask to desired casting temperature.

CAST AND REMOVE INVESTMENT

Cast either centrifugally or with vacuum assist.

Allow the flask to cool to room temperature, until it can be handled without tongs. CAUTION: Plunging the flask into water, while it is still hot, will cause cracking of the casting.

Remove the bulk of the investment by tapping the button or the side of the flask.

Clean the casting by placing the cluster in hydrofluoric acid for one hour to dissolve the remaining Investment.

Removal of Investment

After casting, the flask must NOT be immersed in water, but allowed to cool at room temperature until it can be held in the hand. The cast form can be broken out of the Platinite by tapping the sides of the flask and the top of the button lightly with a hammer. The investment breaks up easily but some does remain on the surface of the piece and is difficult to chip away.

Hard to remove investment may be dissolved in Hydrofluoric Acid by soaking for one hour. DANGER: This acid is extremely caustic and should be used only with proper hood ventilation. Keep baking soda ready to neutralize the acid when rinsing the finished piece in water.

Repair of Castings

Pits in the cast surface are easily repaired by fusing. This can be done by reducing one of the sprues to a 14 gauge wire and using it as a welding rod at points which are pitted.

Large areas can be replaced by welding fabricated sections to the faulty casting using chips of platinum as a solder.

FINISHING PROCEDURES

The density of platinum seems to make finishing somewhat more laborious. However, a very fine high polish is readily achieved by following regular polishing procedures and finishing sequences. Further, no oxidation occurs either through heat or atmospheric conditions so the finish is quite permanent. It is best to finish parts prior to final assembly to achieve maximum results.

The following sequence is recommended:

1. File edges and surfaces with #5 and/or #6 cut files.

2. Remove file marks and other surface imperfections with abrasive papers, starting with 240 or 300 and working sequentially through 400, 500 and 600. Silicon carbide or aluminum oxide papers are recommended.

3. Hard to reach areas can be abraded with a scotch stone and water.

4. Burnish surfaces and edges thoroughly with a tungsten carbide burnisher. Lubricate with oil or wetting agent. It is important to do this prior to using the buffing machine.

5. Buffing compounds: Bobbing compound with wool or coarse musling buff; tripoli with fine muslin buff.

6. A Bear-tex wheel can be used in place of bobbing and tripoli compounds for strong abrasion. Use a medium density wheel, best grade (F), 3" diameter x ¾" width. This wheel leaves no residue on the surface.

7. Polishing compounds: White rouge or Bendick's rouge with soft muslin buff.

8. Tumble polishing may be used before or after burnishing (#4).

VIDEOTAPES — PLATINUM JEWELRY WORKSHOP

Five videotapes were made during the two-week workshop. Contents are listed below. Tapes may be borrowed from the Art Department at San Diego State University. All tapes are 30 minutes in color and sound.

Tapes I and II should be viewed as one unit. Tapes III, IV and V are self-contained units and may be viewed separately.

TAPE I — PLATINUM JEWELRY WORKSHOP

A discussion of works produced during a two-week workshop in platinum at San Diego State University in July 1979. A detailed view of individual pieces is presented by each artist with commentary on design, aesthetic motivation and specific use of platinum. Artists appear in the following order: Leslie Leupp, Helen Shirk, Gary Nemchock, Vickie Sedman, David Keens, Hiroko Pijanowski, Gene Pijanowski, Gary Griffin.

TAPE II — PLATINUM JEWELRY WORKSHOP

A continuation of Tape I with the following artists: Jane Groover, Marcia Lewis, Fred Owell, Arline Fisch. Concluding remarks and general observations by Project Director, Arline M. Fisch.

TAPE III — PLATINUM, TECHNICAL INFORMATION

A discussion of the specialized tools needed for working in platinum. Demonstrations of various technical procedures by participants in the Platinum Jewelry Workshop held at San Diego State University in July 1979. Techniques discussed as follows: Tools, Arline Fisch; Chasing, Marcia Lewis; Forging, Dieter Muller-Stach; Soldering, Gary Nemchock; Twisted Wire and Sheet Metal Folding, Gene Pijanowski.

TAPE IV — PLATINUM, TECHNICAL INFORMATION

Demonstrations of the cold forging of wire, annealing, and a variety of Japanese inlay techniques, including specialized tools required for these particular processes. Techniques discussed as follows: Forging and Annealing, Gary Griffin; Japanese Inlay Techniques, Hiroko Pijanowski.

TAPE V — PLATINUM, TECHNICAL INFORMATION

Discussion of the fusion and granulation potentials of platinum, fusing being an effective process but granulation a difficult and unsuccessful experiment. Demonstration of fusion of joints by welding, David Keens.

A detailed discussion of the casting process and its specifications for platinum, J. Fred Woell. A detailed discussion of finishing and polishing procedures for platinum, Helen Shirk.

SLIDES

A set of twenty-five 35 mm. slides of works in platinum produced during the Platinum Jewelry Workshop is available through the Art Department at San Diego State University. These slides may be borrowed or purchased at cost.

Eugene Pijanowski
Brooch, platinum, folded construction

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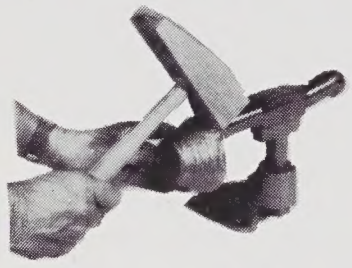

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PEOPLE

AUTOBIOGRAPHY

by Klaus Kallenberger

I came to America as an opportunist and have become a patriot. In Germany I was stifled by a family rich in history and poor in potential. Here, I found a climate of freedom. America absorbs many divergent and often extreme ideas. This is the refuge for every movement unwelcome in less free societies. From the Constructivists through the Bauhaus, to the dissident writers of Russia, from fundamentalist conservatism to anarchist liberalism, men and ideas have found a home and an audience here.

So here am I, a rebellious romantic practical pragmatist. America is the place of "do it yourself" and "we can solve any problems." I, too, do for myself and revel in solving problems, particularly visual ones. I fill notebooks with sketches, notes and essays which get worked, reworked and "worried" until they are solved. Frequently I need a tool or component which I cannot buy easily. So, I simply design and make it myself.

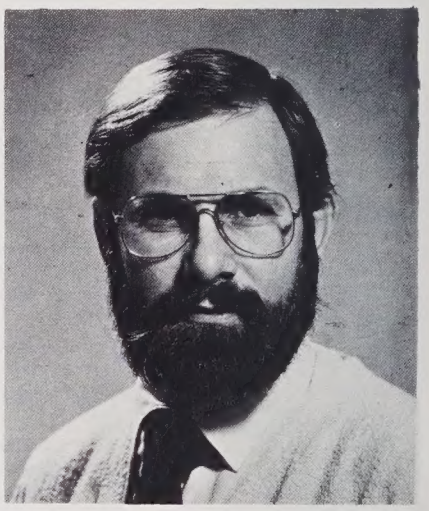
Ideas, genuine original ideas, are rare. To give an idea pertinent form, to create a significant image, is what I see as art. While drawing I search into myself, seeking forms and images which express or manifest understandings about social, economic, aesthetic or theological issues. While I would like this to happen consciously, it occurs far more often when I am deeply involved in visual dialogue with the drawing. The work will suggest alterations and adjustments which will later prove to be far more accurate than conscious design. When I touch a significant and pertinent form, I have entered my field of art - the fine crafts.

To me, jewelry is a very private art form. Great sums of money may be spent, but rarely is the work displayed to the public in the manner of painting or sculpture. One chooses jewelry for intimate purposes. Even though jewelry is three dimensional, it is rarely considered as sculpture. It may have graphic elements or drawing qualities, yet, it is not two dimensional. Jewelry is a form unto itself.

To me jewelry is a question of weight, wearability, proportion and statement. A necklace or a ring will give the wearer much pleasure in a physical sense when the weight is appropriate, the surfaces well finished and the object does not restrict movement or impede one's activities. My aesthetic preferences lie in the relationship of proportions, shape and surface, texture and lines. I am not a Bauhaus purist, but I do believe in restrained surface treatment and elegance of line. Horizontal forms (ovals and super-circles) and symmetry have powerful influences over my designs. Perhaps they are a search for constancy and tranquility in an otherwise anxious and pessimistic psyche.

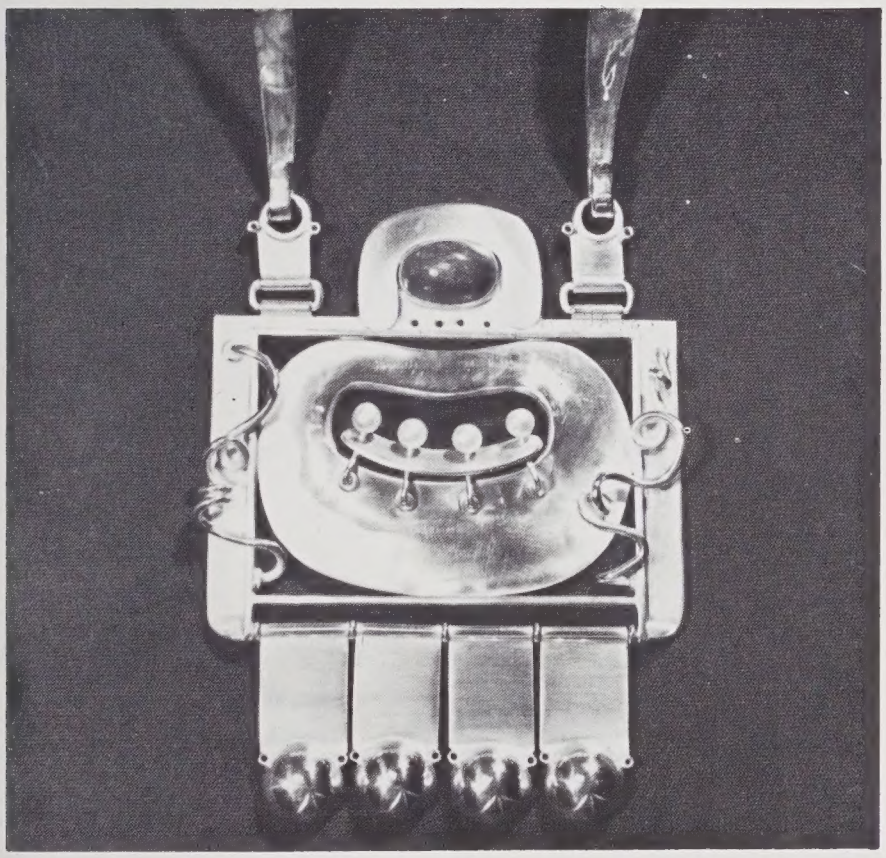
The touch of metal and of plastic are reassuring and relevant in an age of so many machines, appliances and things. We are surrounded by streamlined technology augmented with synthetic components - knobs, handles, padding. We are obsessed with buttons which activate hidden complexities beyond comprehension. We see tubes and wires, conduits and cables, pipes and levers, knowing something is happening, but not understanding what. Written information is screaming for attention in unbelievable quantities. Visual information assails the eye on all sides. We are living in a world so much removed from the natural environment that I find the use of shells, ivory, wood or other organic materials to be romantic irrelevance. Metal, of course, is also a natural material, but it is always altered by man and rarely used as nature serves it up. We are now seeing the metals of space and flight technology in jewelry (titanium, aluminum, rhodium, etc). The hand-made object is both an anacronism of our time and an alternative to the machine produced things around us. I still strive to achieve technical excellence and accomplish difficult techniques knowing that rarely would anyone mistake my work for that of a machine.

Jewelry is also a private art in that it is worn directly on the skin. There are undeniable sexual implications about this. A necklace will draw the viewer's eye to the neck and bosom of the wearer. The body is emphasized by the jewel. Shape, texture, color and size have satisfied the need to be seen, to exert one's ego, whether giver or wearer. The luxury of costly materials and the sumptuousness of feel are erotic. Many messages, intricately intertwined in the complex communications systems of mankind can be



signalized with jewelry. Some of the images which arise in my work leave no doubt about erotic appeal.

The path of life is filled with many fears. There is the fear of failure. There is the anxiety of not being accepted, of personal identity and of certainty. Often one is tempted to abuse dexterity. Technical virtuosity and innovative techniques become a substitute for ideas or statements. Bench work for me is 'pay my dues time.' Rarely does this have anything for me to do with art. I work essentially from drawings. Yet, working with tools and metal keeps me close to the essential disciplines which help me find myself - where I am and what I believe. Bench work keeps my eye sharp for detail and helps me improve my designs with refined awareness and renewed sensitivity. The intensity and concentration required in jewelry making are the same as with any other human endeavor. Discipline is the secret of the athlete and the scientist, the parent and the

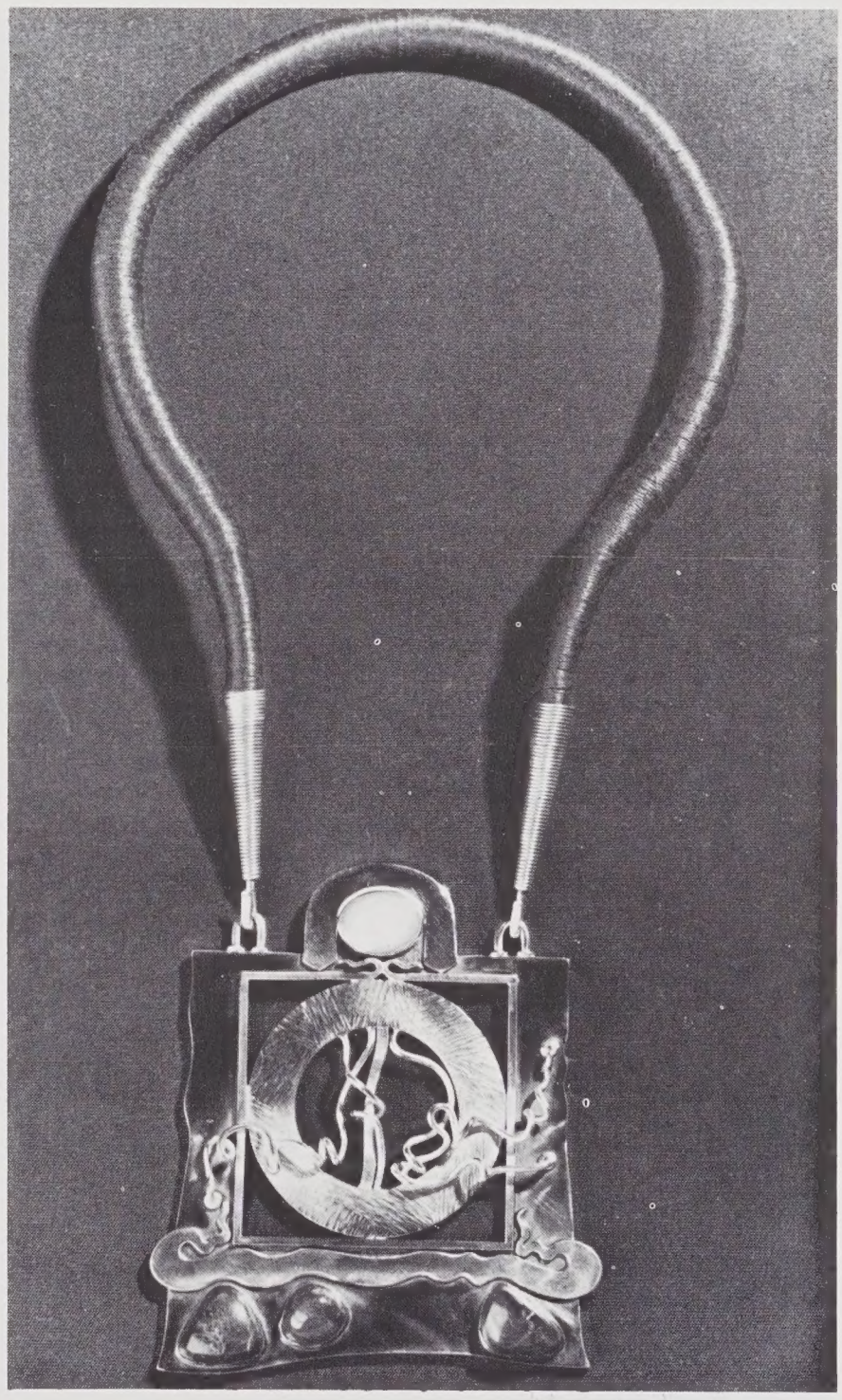


Klaus Kallenberger
Sterling necklace, pearls, lapis lazuli, gold plated

goldsmith. Through this intimate involvement we discover the realm of ideas.

I want my jewelry to be more than precious metals, more than merely elegant or, at worst, pretty. I want my jewelry to be part of my ongoing struggle to mature and understand the life around me, now and here. I want it to reflect a resolution of issues and offer an image which can speak to others. I want my things to be worn and valued for the implications they carry in their designs and images. I hope my things reassure and warm, question and inform, delight and frighten.

In the meantime, I have discovered another fine craft form: teaching. Teaching is synonymous with discovery, communication, identification of self and search for a truth. My students question as I do. They struggle as I do and delight in success. With this constant stimulus I keep alert, engaged and searching. I try to create an environment in which they can experience the rewards of jewelry as I do. Seeing their struggle humbles me. It reaffirms the need for patience and tolerance. How much of the obvious beauty of metal lies in its patience and tolerance.



Klaus Kallenberger
necklace, constructed sterling and bronze disc, opal, lapis lazuli, blue fiber wrapped cord

AUTOBIOGRAPHY

by Zella Marggraf

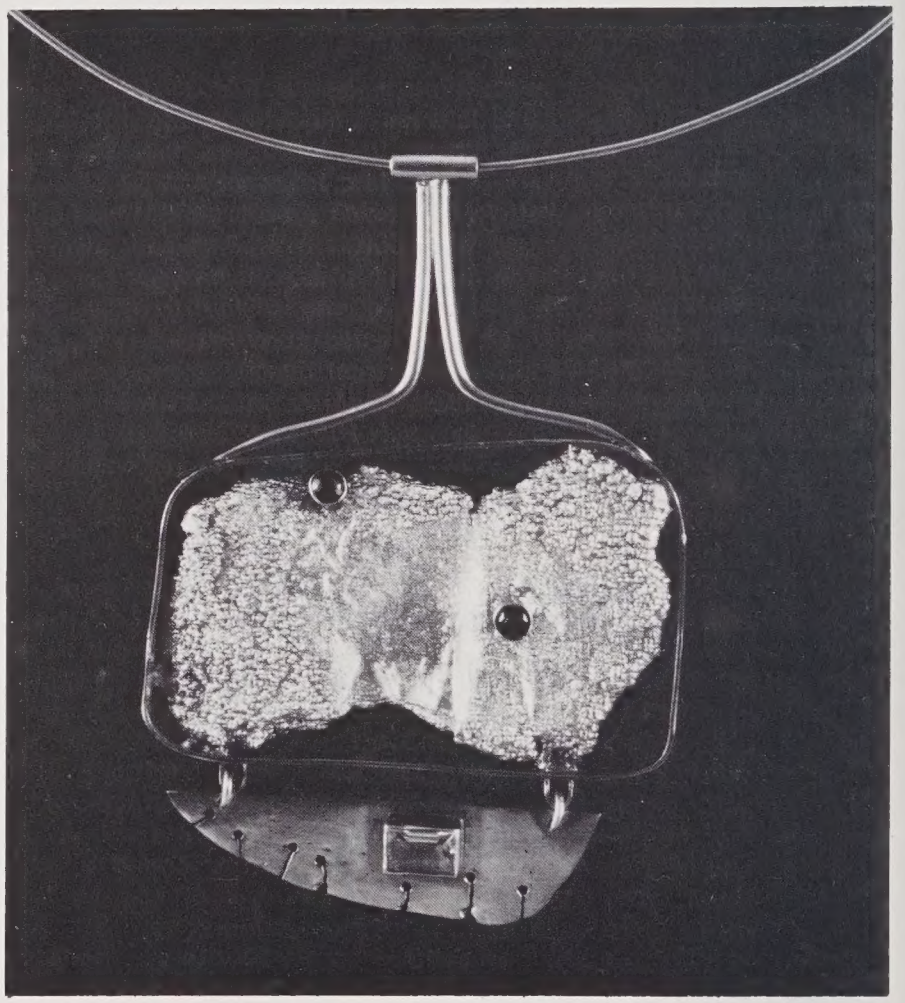
As a young child I spent a great amount of time drawing, painting, reading, or making things. In the first grade, the art teacher often stood me on a chair at the blackboard and with colored chalks in hand, I would draw an enlarged image from a postcard on the board for the class to copy. A copy of a copy of a copy - rather interesting, thinking of the possible mutations that could take place. The first time I did it, as I was giving instructions to the students, I noticed the art teacher and the classroom teacher in the back of the room, hands over their mouths and eyes crinkled.

It was a long time from that scene to the Cleveland Institute of Art, where for the first time I was with others who had similar interests. It seemed like a place full of wonderfully tolerant people. I came to Cleveland by train each day and it was invariably two to three hours late. Consequently I was never able to get to perspective or rendering class and only occasionally to art history. I was told I could study these subjects on my own time. During this period I took a couple of metal classes and learned to solder silver and pewter. Metal interested me, but so did drawing, design, and painting. I was unable to focus upon only one thing - everything was interesting and I wanted to do it all. I received two tuition scholarships which greatly encouraged me and made it possible for me to continue. Upon graduation I left, wondering what I was going to do except to teach. I did teach, first as an art supervisor in Garfield Heights, a suburb of Cleveland, where there was a wonderful mixture of children of various nationalities, many of whom had a residue of the European regard for art.

After a few years my husband and I migrated to California where in 1957 I received an MA in "Applied Design" from UCLA and began teaching at Los Angeles Valley College. I taught drawing, design, textiles, and jewelry. Interacting with students was often interesting, sometimes amusing, sometimes exasperating. It was always a challenge to present a great deal of material in a clear and cohesive manner that would stimulate the students into creative action as well as contribute to their understanding. Teaching was very demanding as the amount of physical, intellectual, and emotional energy required was great. It was always necessary to be "up" and "on."

At Valley College I received a faculty released time grant in 1972-73 for jewelry research. In 1973-74 I had an NEA Grant for jewelry and in 1974-75 an NEA Master Craftsman Apprenticeship Grant. Since 1975 I have been working in my studio, located in an interesting old building that houses studios of artists and writers.

I have worked in isolation from other goldsmiths and jewelers for the most part, not from choice but by chance. I am mostly self-educated in metal. I studied briefly with a German-trained goldsmith which was a very good experience and technically rewarding. It was not until 1965 that I began to concentrate more upon jewelry; up to that time I was not satisfied with my work.



Zella Marggraf
"Rari" Pendant, 2¾" long, 18k, F/S, Euclase, rubies

I like metal - both the resistence and the ductility, the flowing organic as well as the crisp architectonic forms of which it is capable. While the materials are challenging, in jewelry they are of human scale and do not require unusual physical strength to form.

In making jewelry I do not make elaborate drawings, models, or mock-ups. Often the chance juxtaposition of materials causes an idea to materialize. After the initial

idea and perhaps a sketch, I begin to visualize the piece as far as I can and then begin work. At some early stage the articulation of the parts and their relationship to the whole are decided; mechanical joinings are determined. Ideas however are not fixed - the possibility of change is always present. All parts are relational. Chance, variation, disorder, as well as order and unity as procedures are important to me. In art in general, I am interested in ambiguity, paradox, and surprise.

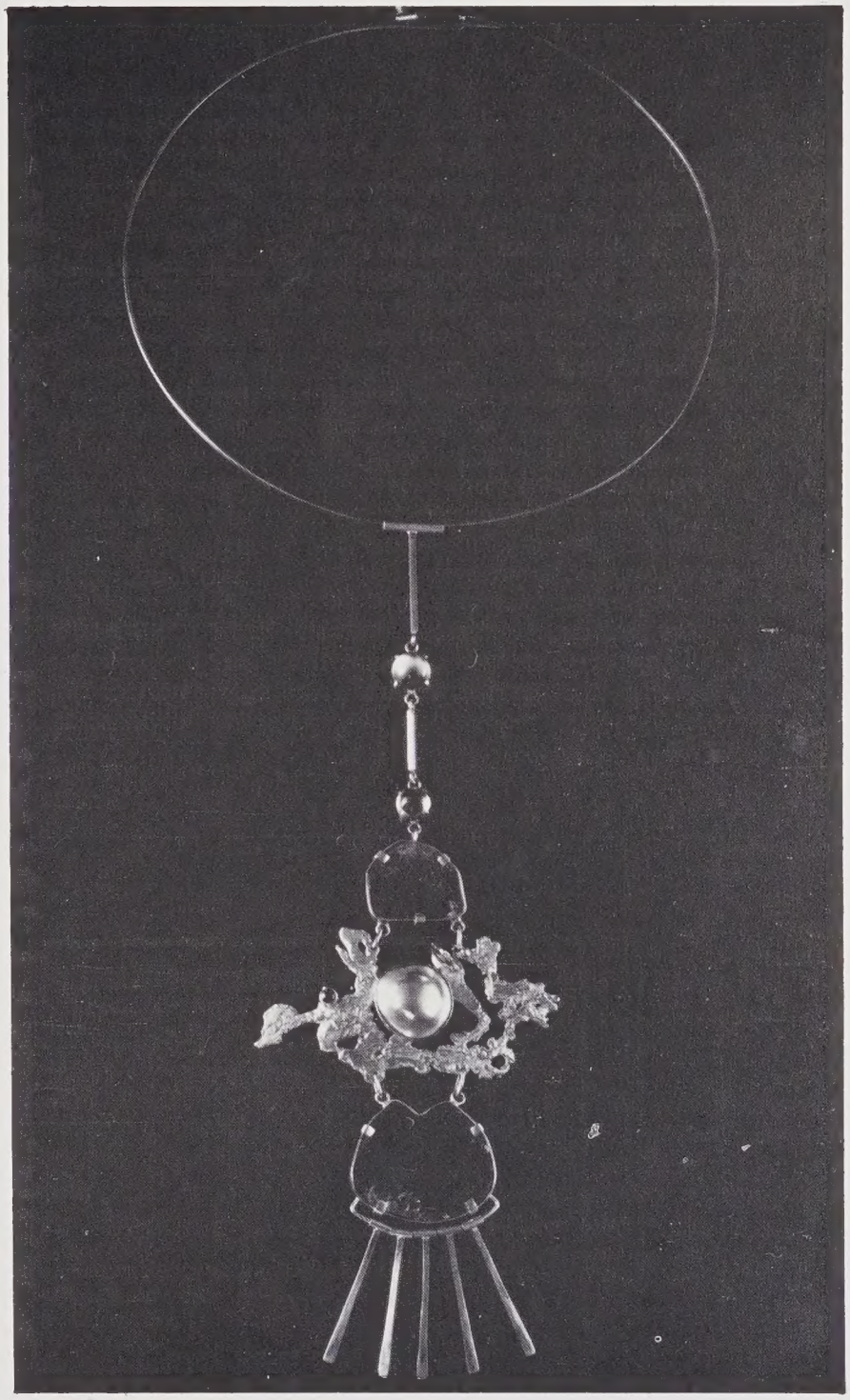
Although I have spent much time trying to learn various techniques - I think I tried many times to reinvent the wheel - I now tend to use fewer. I prefer direct working of the metal to casting or electroforming. Some forming techniques and surface treatments which are health hazards I now try to avoid or do less often.

Although I use various metals as well as other materials, my jewelry is made mostly of 18K - I like its color and working qualities. The issue of jewelry being connected with status, which raises social/ political questions for some artists, causes me no problems. I think of jewelry, as other art, as totally independent of its intrinsic value, which has nothing to do with jewelry as an aesthetic object. Anyway, the possession of art in any form has always been a status symbol and everyone needs status of one kind or another.

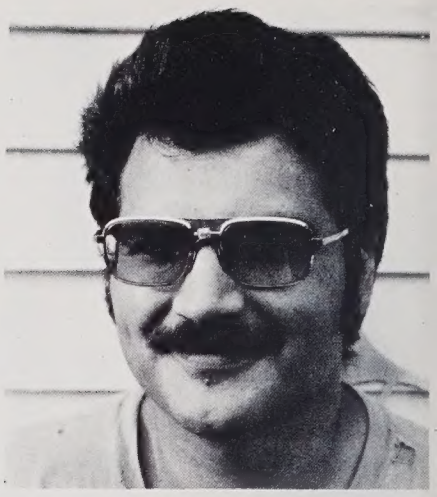
I find the study of drawing, painting, printmaking, photography, as well as jewelry have all contributed to the other disciplines; a kind of cross fertilization with techniques of one useful in another, sometimes directly sometimes indirectly. I believe in specialization but not to the extent of excluding all but one medium of visual expression. I believe the ideal preparation for a goldsmith would include university art study as well as apprenticeship training with a master goldsmith.

In most autobiographies there are teachers or others named who have been influential in the artistic development of the individual. Strangely, I can find no one such person, perhaps because I have not formally studied jewelry as much as other art subjects. Although I had a positive attitude toward most of the professors I had in art school and college, I learned little that was concrete - just as well as it forced me to dig out what I needed to know.

There is no one region in the world whose jewelry is most interesting to me, though the jewelry of Morocco and the Near East I like as much as any. Usually I find anthropological museums such as the Musee National des Arts Africains et Oceans and the Museum of Man in London have interesting examples. In the British Museum it is stimulating to see the marvelous jewelry astonishingly crafted by such ancient anonymous goldsmiths as those who made the Sutton Hoo treasure. But in the final analysis one finds much contemporary jewelry extremely intriguing and amazing.



Zella Marggraf
"Dingla" pendant, 6½" long, 18k, tourmaline slices, blister pearl, rubies, moonstones, cat's eye tourmaline



AUTOBIOGRAPHY

by James Seavey

Beginning as the middle son of a bankrupt boat builder, my course towards independence as an artisan has hardly been a steady one. When I was a year old my family moved to Cape Ann, Massachusetts to be near both the architectural job market and the ocean. Twelve years later my father died, causing me to spend several years hiking in the 'high country of the mind' (see Zen and the Art of Motorcycle Maintainance). I rejected Monotheism on a human scale, neglected my early interest in the plastic arts and wrote lots of bad poems about the nature of the universe and my adolescent suffering. All this heavy thinking landed me as a freshman at Hamilton College in 1965. The demands of academia soon shriveled my interest in the two-dimensional page and rekindled my need for non-verbal expression.

I transferred to Rhode Island School of Design with the express purpose of becoming a sculptor 'in the tradition of Michelangelo and Rodin.' Concerns about making a living and a newly found interest in cinema film found me enlisting in Graphic Design after a year of basic design. Despite the enormous influence printed matter has had on my life, I was frustrated once again, claiming the end-product of all the graphic arts suitable only 'for wrapping fish.'

Industrial Design seemed an acceptable compromise between sculpture and a livelihood, so I found myself a sophomore once again, much to my mother's consternation and my new wife's delight as now we were both members of the class of '71. My first semester included a course called "light metals technology" with none other than John Prip. It was a full year before I was firmly established as the only member of my class to be a full-time metalsmithing student. A short year and a half after that, I was graduated.

Since I was one of only a handful of undergraduates, my assignments had a more than usual looseness. My mind tended still to think in literal terms, so my work was more concerned with technical experimentation than visual expression. One day Jack showed me how to use the bent-file scraper to relieve a ninety-degree bend. I took the tool, scribed a curved line, and folded the metal, which produced the concave-convex relationship now prominent in my work. Shrugging my shoulders, I said, "That's neat," smiled at Jack, who smiled back, and I returned to my interrupted job. Instead of a rigid program, Jack taught by his presence, his intuition of what would be useful to an individual based on long experience and sound knowledge. I may have missed a certain structure to my learning experience, but I gained insight into an attitude that had taken a lifetime to develop.

I returned to Rockport to an expected job teaching junior high metal shop in a neighboring town. After a favorable interview with the superintendent, the principal balked at my ponytail and, fortunately, I was forced to look to industry for employment. Old Newbury Crafters in Newburyport, which I had discovered while looking for Towle Manufacturing Company, was riding a growing wave of interest in pewter. I had spent the previous summer working for a Rockport pewterer where everything had been made "on the stump" (dapping) or by seaming conical cylinders. ONC is a small shop, unable to afford a full-time deisgner, so I agreed to be a designer-producer for minimum wage. This proved to be a valuable experience, because I could design, tool and then produce an item, getting first-hand feedback on production problems. I had to work on a tight schedule, so I would often make prototypes by turning down discarded spinning chucks (forms) with little preliminary drawing (and no market research). I could adjust errors in design as the work progressed. Sometimes, in the case of the drop or screw press, the production tool would be made directly from my handwrought original. Since handwork was the hallmark of ONC sterling, a certain amount of hammering and fluting was used to enhance the otherwise machine-made products.

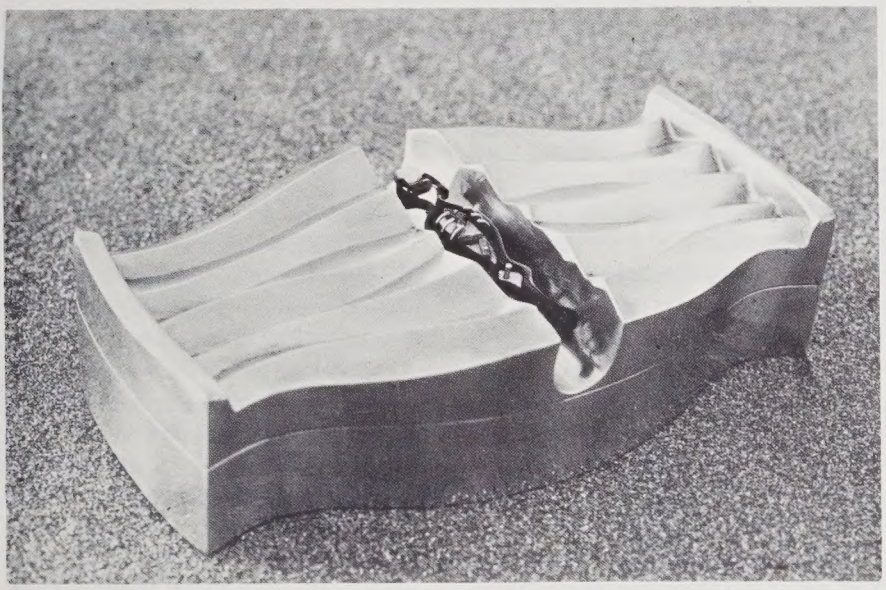
After two years, I began bumping the limits of the job. I was learning less, designing less and doing more and more production management. The old drive for self-expression was pressing. With the financial help of my wife, Gail, who was by this time teaching under my old friend the junior high principal, I

James Seavey
"Encrustation" box, pewter, oyster shell, 4¾" high

tried to start my own business. However lack of funds, knowledge, and confidence soon had me screwing up my courage to seek employment in one of the Guild companies as a designer.

I had visited Gorham Silver Company as part of my industrial design education and was unimpressed with their traditional approach to design. But after being interviewed by the new director of design, Burr Sebring (another of Jack Prip's former students), I was happy to accept a position on the staff. This move back to Providence made me realize the vast influence the land/seascapes of Cape Ann had had on my vision. I produced a series of "Beach Boxes,"

James Seavey
"Sea Creature" box with removable pin, pewter, ebony, antique ivory, sterling, coral, shell



each reflecting qualities of a particular beach on the Cape, and the "Polyhedra Series" based on studies of paper folding and the geometries of the granite quarries and natural formations so much a part of my awareness.

During my stay at Gorham, I developed a deeper understanding and appreciation of traditional design - the use of sculptural elements lifted from Greek and Roman architecture. My compelling interest was in the turn of the century revolt against that tradition - Art Noveau - which developed a new vision within an old technology. The Bauhaus may have continued the revolt by emphasizing machine technology, but I feel the scope and energy of the Art Noveau movement is of great importance to the contemporary artisan.

The Gorham Company was at its height in 1900. Its library, casting pattern and die vaults are rich in basic source material about the arts of the time. The company had employed over one hundred chasers alone, as well as engravers, model-makers, sculptors, toolmakers and designers by the score. Many of these anonymous craftsmen left their mark and some stories survive about individuals. One was a Frenchman who carved blocks of tool steel into highly ornate stamping dies with no reference to drafted designs. A chaser appeared out of the woods one day, twigs in his hair, etc., and showed his work to the president. So unusual were his samples in concept and execution that he was hired on the spot, given some cash and a place at the bench. Six months later he disappeared back into the woods. I saw the work of both these artisans in the vaults.

My desire for independence, fostered by the heavy corporate structure at Gorham and a long strike during which I was obliged to spend my days polishing spoons, caused me to accept a position as Plant Manager for Faithcraft International in Pittsfield, Maine, a division of C. M. Almy & Son of Rye, N. Y. I was given the task of expanding and equiping a tiny cellar workshop, and hiring and training additional workers to produce and repair church metalwares. I discovered also that the entire inventory of imported goods was in need of attention: some repairs, much refinishing and total repackaging. In directing two years of growth at a frantic pace, I developed the confidence I needed to start my own business. I was no longer afraid to call large companies, pump their technical staff, then inquire the minimum order and try to bargain down from there. I learned, by necessity, how to file and organize business information (and why), how to schedule production and control quality, and how to deal with employees. I learned from my mistakes as well as my successes. I began to hate the swamps and pines of central Maine and long for home.

In 1978 we made the big step. We moved back to Cape Ann and started our own businesses, Halibut Point Pewter and Tide-Star Earthworks.

My work is divided into four roughly equal parts. One is paperwork-design, letter writing, business forms, bookkeeping, and photography. Another is production work - a line of pewter hollowware with little variation one piece to the next. Then tooling and maintainance which includes the most and least interesting jobs - making something new and sweeping the floor. At last, one-of-a-kind work, on commission or as an experiment. With the help of a sales rep, I hope to see business increase to the point where I can hire help for much of this work and concentrate on unique work.

Unique work leads us back to Cape Ann and the high country of the mind. It seems to me that the aims of art and science are one: to make order out of chaos. In science the routine approach is to take small bits of chaos and poke and prod, run the gamut until some piece of sense emerges. With art, whole chunks of chaos are digested at once and complex assimilations are offered to the viewer in a synthesis of interior and exterior experience. My work, like that of most artisans, uses the mental attitudes of both art and science, in that the processes used in a particular craft define the limits and provide a structure in advance of the all-encompassing whirl of art. Scientists trust their tools, artists their intuition; artisans trust both. I have a life-long appreciation for Duchamp's concept of found art. I am beginning to incorporate bits of worm eaten, wave-worn shell and splintered or sea-smoothed stone into my works. I also use freshwater pearls and organic material dried and varnished or otherwise preserved. I have trouble conceiving the transitions between the geometric, pure form constructions of sheet metal and these fugitives from chaos, each bearing the marks of seemingly infinite circumstances. These transitions may be arbitrary, but they remain technically interesting and artistically challenging.

FEATURE ARTICLES

OLD SHEFFIELD PLATE

by T. W. Frost

Edited by Catherine Lippert, Associate Curator of Decorative Arts, Indianapolis Museum of Art

The idea of covering a base metal with a thin layer of silver was not new when Thomas Bolsover (1704-1788) of Sheffield, England, discovered a means of plating silver to copper through fusion. Indeed, for hundreds of years ancient metalworkers had covered base metal objects with silver, thus providing the consumer with an inexpensive look-alike for the solid silver article. Nevertheless, their technique was not wholly satisfactory, since it was impossible to achieve a total union between the completed base metal object and the silver foil covering which it subsequently received under pressure.

As early as the 18th century, and perhaps much earlier, another technique for emulating solid silver, known as close plating, was adopted in England. This method involved the manufacture of an article, usually of steel, to which a coating of molten tin and a flux was applied. Silver foil was then carefully superimposed upon the coated object and fixed there by pressure and the heat of a soldering iron passed lightly over the surface. Close plating, however, was a laborious process, suitable only for small objects requiring a cutting edge or undergoing hard wear. The technique was used in England up to the mid 18th century, and again in the early 19th century, and was a particular specialty of Birmingham.

In 1743, close plating was replaced by a more successful method, that of plating by fusion. In Sheffield, England, a city renowned for its cutlery, Thomas Bolsover discovered that a sheet of silver superimposed on an ingot of copper fused inseparably when the two were heated to the melting point of silver. Most important was the fact that the two metals behaved as a single unit, retaining the same ratio of silver to copper no matter how much they were hammered or rolled under pressure. Unlike the earlier techniques in which the object was first made and then plated, the desired article could now be fashioned from a sheet of previously plated metal. At this moment, Old Sheffield Plate was born.

Bolsover's invention meant that, for the first time, tableware and other household articles could be made and sold cheaply in quantities which soon rivaled the production of costly silver plate. The latter term ("plate" being derived from the Spanish word plata, meaning silver) denotes articles of solid silver, silver-gilt or gold, and should be distinguished from British-made wares plated with a layer of silver by means of fusion. Such wares are popularly referred to today as "Old Sheffield Plate."

Ingenious though he was, Bolsover never advanced his technique beyond the manufacture of buttons and small boxes. Soon, however, the process was adopted by others who expanded the range of plated objects available. A distant relative of Bolsover's, Joseph Hancock, launched the plating industry in Sheffield by manufacturing saucepans and candlesticks in the early 1750's. Hancock was followed by Thomas Law (1717-1775), Nathaniel Smith, Henry Tudor (1738-1803) and Thomas Leader, whose names have gone down in history as the pioneers of what became an enormous industry. Probably the best-known of all is Matthew Boulton (1728-1809), who established the trade in Birmingham in 1764 and became England's largest single manufacturer of Old Sheffield Plate. His importance lies not only in the high quality of his plated wares, but also in his use of the machine and mass production techniques which mark him as a precursor of 19th century industrialism.

Despite the variety of items produced by the manufacturers of Old Sheffield Plate, flatware was never a successful product. Daily use tended to wear off the silver surface irregularly, leaving the underlying copper visible in unattractive streaks. A spoon worn in this fashion was not a very inviting eating utensil.

With the advent of Neoclassicism (or the Adam style, as it is called in England, since its greatest advocate was the architect-designer, Robert Adam), Old Sheffield Plate attained a technical and aesthetic excellence. Whereas the craftsman who made Sheffield plated wares was also capable of producing the same items in silver, the silversmith often lacked the technical skill necessary to create plated wares. The material for Old Sheffield Plate was in itself superbly suited to the simplicity of the Adam style. Manufacturers avoided elaborate ornamentation and working of the metal which might cause the thin silver covering to crack or flake. In this respect, the designers of Old Sheffield Plate may, to some extent, be regarded as leaders, rather than followers, of the Neoclassical mode.

In general, Old Sheffield Plate emulated and even duplicated the designs of contemporary silver as, for example, the cake basket, which is identical to a Sheffield-made silver version in the collection of the Royal Academy in London, and which may well be a product of the same manufacturer. This elegant piece, conceived as a simple oval ornamented with urns, rosettes, bell flowers and swags of drapery, epitomizes the Adam style. Unlike silversmiths, however, the manufacturers of Old Sheffield Plate were not required to stamp their goods with identifying hallmarks; consequently, most plated wares, including the cake basket, are unmarked. A few makers and retailers, however, did add false hallmarks to their goods, hoping to suggest to the unwary that the article in question was indeed of solid silver. In 1773, increased pressure from silversmiths resulted in a law forbidding the makers of Old Sheffield Plate from marking their wares. Although this law was revised in 1784, when Old Sheffield Plate manufacturers were allowed to stamp their goods with the maker's surname accompanied by an emblem or device, few in fact bothered to do so. Those who did generally adopted only an emblem; the most famous of these is the double sun mark of Matthew Boulton.

A proliferation of new shapes in everyday objects characterizes Old Sheffield Plate of the late 18th century, some of which may be unfamiliar to the present-day viewer. The traditional tea and coffee pot, for example, was outmoded by the vase-

shaped tea or coffee urn, often equipped with an in to receive a heated iron. Lighting devices such as the bougie box and the wax jack were designed to hold the wax taper. When the taper was lit, these furnished a ready source of flame for lighting candles or sealing letters, and also served as small, portable lights when required. The argyle, named after the fourth duke of Argyll who is said to have introduced it, was a double-walled container whose inner or outer space was filled with hot water to keep gravy warm. The biggin, a straight-sided, short-spouted coffee pot with a built-in filter, appeared on the market just before 1800. While these forms were common to both silver and Old Sheffield Plate, a number of improvements in the design of household items was due solely to the genius of the Birmingham and Sheffield manufacturers. One of the most interesting of these is the telescopic or "sliding candlestick," as it was called, patented by Samuel Roberts (1763-1848) in 1798. The sliding section was supported by one of a series of interior notches, and could be raised or lowered by rotating the shaft to disengage it from the notch.

Perhaps more than anything, it is the ingenuity and technical skill evinced by the craftsmen of Old Sheffield Plate which most attracts the collector and connoisseur today. Simple, shallow wares such as bowls and tureens were hand-raised by the traditional silversmith's technique of hammering the metal sheet over a steel stake.

For more cylindrical, steep-sided items, the craftsman usually bent the sheet into shape, soldered the ends together, and completed the article by soldering a circular base into one open end. With this technique butt seams and occasionally dovetail seams are encountered. When the worker used a solder of high lead content, the same is often visible, or can be made so by breathing on the join.

The adoption of die stamping by the Old Sheffield Plate industry marked the birth of mass production techniques still in use today. The process involved a metal die bearing the desired shape in intaglio, onto which was placed a sheet of metal. When struck from above by a hammer bearing the same shape in relief, the metal was forced into the hollow interior of the die, thereby acquiring the desired shape. To create the finished article, various stamped units were soldered together. Stamping was particularly used in the production of finials, feet and handles, all of which were strengthened with a solder fill. Spouts and lids were also stamped, and after 1790, flat work such as salvers and trays were often made in this way.

At about the time that Thomas Bolsover discovered a means of fusing silver to copper, Benjamin Huntsman (1704-1776), working in Sheffield, produced a crucible steel which surpassed in strength and toughness all previously known steel. Huntsman's invention made it possible to create steel dies capable of stamping a great number of identical, sharply defined pieces without the die itself becoming worn. Die stamping emerged as a Sheffield specialty, and for the next hundred years the majority of silver and plated candlesticks had their origins there.

Early examples of Old Sheffield Plate are of great interest, illustrating as they do some of the problems facing the first manufacturers of this ware. Many of these objects were plated on one side of the copper only, a fact of little consequence as long as the copper surface was not exposed to view during normal use. Thus the undersides and backs of trays and wine labels and the insides of dish warmers were of copper. The interiors of hollow ware such as tea and coffee pots, however, were usually tinned, an economy measure which persisted even after a technique for plating on both sides of the copper was devised between 1763-1770. The sweetmeat basket, consisting of two sheets of copper, each silvered on one side only and placed back to back, demonstrates the cumbersome way in which objects with highly visible surfaces were produced before the advent of two-sided plating.

Despite advancements in plating, the finishing of edges continued to pose a problem to the craftsman of Old Sheffield Plate, for wherever the metal was sheared, its copper core was exposed. At first silver solder was applied to the edge to conceal it, or the edge itself was folded over by hammering. Later a ribbon of solid silver was often soldered to the rim. The join was concealed by burnishing. With these techniques, however, constant use and polishing ultimately revealed the underlying copper. By 1785, the manufacturers of Old Sheffield Plate began using hollow U-shaped silver wire which they soldered over the raw edge.

The use of silver mounts, narrow bands of metal made separately and then applied, was an important advance. After about 1790, most mounts were not cast but die-struck in strips several inches long at a time. The mounts were reinforced by filling them with a lead-tin alloy, and were soldered to the article for decoration, reinforcement or to disguise a copper edge. When applied to a rim, the mount often extended beyond it. The craftsman folded this overlap over the edge, thus completing the illusion of solid silver. The solder fill of many mounts can often be detected in areas where the silver has worn away.

In addition to the exposed copper edge, the fashion for engraved designs also posed a problem to the manufacturer of Old Sheffield Plate. The technique of engraving involved the use of sharp tools to gouge out the metal which, in the case of plated wares, left the copper core exposed. As a result the craftsman adopted flat chasing. Using tools to indent the surface of a piece, he both simulated engraving and duplicated its designs. A close inspection of the interior or underside of flat-chased objects often shows that the pattern has been chased through.

A similar problem arose when a worker engraved an owner's crest, coat of arms or monogram onto an object. Today, copper exposed in this way, although originally considered a blemish, is favorably regarded by most collectors. From about 1789 on, a hole was sometimes cut into the side of an object and a

John Young and Company
Cake Basket, silver, 1779
photo courtesy Indianapolis Museum of Art

piece of heavily plated copper or solid silver soldered into place to allow for engraving. By 1810, a neater technique was evolved in which a thin wafer of silver was made to adhere to the surface through heat and rubbing. This most difficult technique was used on many large objects made later. "Rubbed in" silver shields, as these are called, are difficult to detect, and can sometimes be found by breathing on them. Tarnishing tends to reveal the shield due to the different oxidation rates of the sterling silver surface and the pure silver wafer.

The fashion for pierced articles created further problems for the Sheffield plater. Any attempt to cut the plated metal with the silversmith's piercing saw produced the most appalling exposure of copper. The adoption of the fly press solved this problem most satisfactorily. This was a heavy machine which bore a blade in the shape of the desired pattern. The object was placed on a steel bed sunk with a similarly-shaped pattern into which the blade entered after it had guillotined its way through the metal sheet, dragging with it a layer of silver which successfully concealed the copper core. This technique represented another step towards mass production, and was soon adopted by the silversmith as well.

In 1840, George and Henry Elkington of Birmingham, England, patented a process for plating base metal objects by means of electrolysis. Unlike plating by fusion, a layer of pure silver was deposited onto an object made in base metal by passing an electric current through a plating bath in which the object was immersed. Within a decade, the art of plating by fusion was all but forgotten as platers began adopting the electroplate technique under license from the Elkingtons. Electroplated wares, as these are called, are often mistaken for Old Sheffield Plate, and can sometimes be found bearing such marks as "Old Sheffield" or "Sheffield Plated." For the collector, caution must be a watchword.

Because the process of plating by fusion is costly and beyond the skills of most craftsmen today, it is unlikely that an individual will encounter a downright fake. Nevertheless, renovated Old Sheffield Plate and later reproductions exist in great quantities, creating confusion for the collector. In both instances, the use of electroplating is involved.

During the second half of the 19th century, many pieces of Old Sheffield Plate were electroplated to cover the copper core, visible after years of polishing and use. The silver surface of such items has since become worn, leaving the copper once more exposed and making detection of an unrenovated piece particularly difficult for the collector.

In addition, during the early 20th century many reproductions of Old Sheffield Plate were made using the extant designs or original dies to shape copper articles which were subsequently electroplated. With time these objects, too, reveal the underlying copper, and can look genuine to the inexperienced.

A knowledge of the differences between an object plated by electrolysis and one plated by fusion is essential when collecting Old Sheffield Plate. The electroplating process deposits a layer of pure silver, which is white in appearance compared to the sterling silver used to create Old Sheffield Plate. The surface of the latter is made up of silver alloyed with copper in a ratio of 92.5 to 7.5, and is characterized by a blue-gray tint. A silver interior in hollow ware such as tea and coffee pots, which were generally tinned, is indicative of electroplating.

Mounts and edges can also be factors in determining the authenticity of a plated piece. Very early examples of Old Sheffield Plate are inevitably worn through to the copper core in certain areas. Objects made after about 1785, however, should have mounts of silver reinforced with a solder fill. In such pieces, extensive wear will reveal the solder. Suspect, then, any article bearing decorative borders or mounts worn down to a copper core. This applied particularly to gadrooning.

The location, presence or absence of a seam on an object is also important in determining whether a genuine article has been renovated. Because the copper core of fused plate is less ductile and hence more prone to damage with the hand-raising process, hollow ware made by soldering the ends of fused sheet metal together, as discussed above, is more typical of Old Sheffield Plate than of solid silver. Handled items such as mugs and coffee pots inevitably have their seams on the body beneath the handle. The latter, if it is hollow, will have a seam on its own underside. Candlesticks have seams running vertically into one another, where more than one component exists. Ball-shaped finials and feet have circumferential seams since spheres were made in two sections. Tea and coffee pot spouts have seams along the inside-facing surface of the spout. When a piece of Old Sheffield Plate is renovated, its seams become invisible, since the electroplating process covers everything. Often only the exterior of an object is electroplated, leaving the interior seams visible—a sure sign of electroplating in hollow ware. A rubbed-in silver seam will also be obliterated by electroplating. Be suspicious, then, of an engraved crest or coat of arms with no apparent silver wafer, and which shows no copper in the engraved portions. Even with subsequent wear, the re-emergent seam will never have its original lead-like color.

From a technical point of view, the manufacturers of Old Sheffield Plate were, in many instances, the first to try or adopt such machine techniques as die stamping and the use of the fly press, to name but two, and in this respect they fostered the first technological revolution in metalwork.

Today the early wares made by the craftsmen of Old Sheffield Plate are highly prized by collectors and museums alike. Originally produced as an inexpensive substitute for silver, Old Sheffield Plate is for that reason all the more interesting today, illustrating as it does both the stylistic and technological advances of its time.

ALSOP • McCONNACHIE, a Limited Edition Corporation

by Barbara Young

In order to present to the American reader the way of life of a young British couple - a jeweller and silversmith of Sheffield, England - the very different world of Britain must be brought into focus, just for a moment. The single great patron of the American craftsman is the university system, supported by the American tax dollar. Thousands of artists can and do experiment to the very frontier of their exuberant imaginations in that arena, secure in their university salaries. This is a truly remarkable and typically American phenomenon, and has done an incalculable service in developing various crafts, especially metalsmithing which was an all but moribund craft prior to World War II.

Britain never suffered a hiatus in the field of metalsmithing. The fact that that collective term could be coined in the U. S., and does not exist in Britain, says it all very neatly. Here there have always been goldsmiths, silversmiths, and jewellers, just as there have been guilds functioning since the medieval times. The assay office has never closed, and its influence gained a new statistic in the Jubilee Year, 1977, when an unprecedented number of forms were hallmarked - the assumption being their value will be greater for the special date stamped on them. Doubtless, the patrons of British art, the public at large, will in the years to come support this assumption, make it a reality, and complete the reciprocal trust from within a society. Another gauge which measures that trust can be found in the relationship between a period of economic recession and the sale of gold and silver forms; they increase simultaneously in inverse proportions. In a recession period the Britisher, who at his best does not spend money as much as he places it, tends toward the conservatism of increased investing in permanent goods.

A second aspect of the great difference between the arts and crafts world of the U. S. and Britain exists in the relationship the British smith or jeweller has with his public - one which to a certain extent he inherits. From his early days as a student, having won a place in a polytechnic, he sees himself moving towards a profession. He expects to support himself by his labour, and he looks forward to a patronage he really knows is out there. And by the same token, the lecturers, the professors who teach these students, seldom involve themselves to any important degree in exhibitions or promotions, though many do private commissions and some to a considerable extent - the public knows where to find the talent. Of course there are exceptions to these generalities, but basically this is not a pressurized system; it luxuriates in a strong sense of place.

A final difference that is contingent on the above is the educational background the student receives in the polytechnic system. Following a foundation year which is as it sounds - a basic art and design exposure - the student spends three years devoted exclusively to his chosen specialization, in the jewelry or silversmithing section within the department. Some of the outstanding students move on to fill the few coveted places available at the Royal College of Art in London and continue their work as postgraduate students. Or, they can move on to one of the larger polytechnics which also offers a postgraduate course.

Geoffrey Alsop and Margaret McConnachie in their studio

It is not only this early specialization and concentration in preparation that assists the young student in gaining a personal image of himself as a professional. He also has a great deal of support during his years in training. As mentioned, the lecturers who are in charge of a course are rather singlemindedly involved with teaching, and not distracted with the range of fronts that the American professor has to meet. Since the student will move through the years into studios of various lecturers, perhaps 10 - 12 students in a class, he will be influenced by a range of different personalities. Criticism and analysis of his developing work will come from several sources, and with graduation his diploma show will be evaluated by outside assessors, representatives within the field or other lecturers.

Beyond the lecturers are the highly skilled professional group, the technical assistants, whose full time responsibility is to realize the more difficult problems the student is encountering, and even occasionally to create entire pieces for them. The philosophy behind this arrangement is that it is important for the student to see finalized the very best he can design even before he

has gained the required technical skills. It is a stretching experience . . . something he must rise to meet. Finally, from out of this heritage of tradition, high expectation level, and sheer pride in sustaining this art form, the studios are endowed with staggering arsenals of equipment which would make the American university system envious to even contemplate. The strong ties and contacts between the polytechnics and industry tend to bring the latest materials and processes directly into the schools. How this traditional, no-nonsense approach combines with the highly individualistic and searching experimentation of the polytechnic studio remains a secret Britist formula others have not been able to export.

With this introduction to the British scene, I feel the American reader can appreciate the route chosen by the Alsops in the creation of their own studio. Margaret McConnachie, a Scot born in 1944 in the coastal village of Stonehaven south of Aberdeen, began her art education in the study of Embroidery and Weaving, making the shift to the metal studio at Birmingham at the postgraduate level. After remaining there as lecturer for one year, she moved on to Sheffield City Polytechnic where she was to lecture for the next seven years, retiring only this past December for the arrival of their second child. Geoffrey Alsop was a student of silversmithing at Sheffield, where he and Margaret first met. Upon graduation he was employed for two years with a Sheffield silversmithing firm, position assumed purposefully with the future plan being to eventually open their own studio. Beyond the insight gained into business operation, the work pace (which required that he learn to fabricate things rapidly and right the first time) proved an invaluable asset in training towards meticulous, economic control.

During this same period, Margaret did commission work in producing prototypes for mass production jewelry forms. Frequently this would mean chasing delicate original forms which spoke volumes of her acute tactile sensibilities and superb control of the miniature scale. These forms would later be mass produced industrially by means of casting. Importantly she was also learning to design to meet the requirements of multiple production. The occasional commission of a one-off piece was simply worked into the routine, as were the one-off pieces made for exhibitions.

Five years ago Margaret and Geoffrey, both groomed in their training and purposefully selected work experience, established a studio which has never faltered from a general trend of expansion. In the early years Margaret was the one to travel about the countryside developing contacts and obtaining orders for their limited edition jewelry composed of two tiers: basic sellers consisting of bracelets and cuff links, and a fashion range mostly of pendants and earrings. During this period they became acquainted with the conservative position maintained by the long established jewelry shops they chose for their outlets. Stable shops, stable sales. The British jewelry business is not built on gamble - they know their clientele and are prepared to serve it, carefully and with respect. The initial problem was to gain the confidence of these business people, who once convinced of an artist's merit, do much to support him by standing firmly behind their work, and promoting and encouraging its sale.

The Alsops design knowingly and sensitively for an aware, though conservative, steadily consuming public. That is where the profit lies - the one that pays the mortgage - and not in the one-off or art piece. That market simply does not add up to a living on a profit-per-hour labour basis. From their point of view at this stage of development, a one-off essentially costs them to make. They do however, accept commissions which are welcomed as a change of pace. The most frequent is in a form that would surprise the American craftsman - the trophy, which is a vital means of group expression that has never had proportionately an American parallel. We are not a people who choose to bring event, place, person, and moment-in-time together into concrete, memorialized precious metal, but the British do, and do so constantly for all sorts of events.

The Alsops objective is to participate in that traditional, standing demand for gold and silver forms by creating work slightly above the expected classic: as Margaret says, "to bring just that little bit better design into the ordinary shop." In this way, they are leading, ever so gently, towards an advancing of public taste. They are satisfied that something of what they learned at art school filters down to the public and is utilized and appreciated. British do not invest in hallmarked fads or artists' personal statements, not at least in great volume. The importance of this category of expression holds an entirely different position in the mind of the British public than it does in their American counterparts. With a heritage rich in metal forms, made from metal mined, refined and shaped on this island for well over three millennia, the British have never been released from the magic spell of precious metal. They love it. And they reward their craftsmen at a rate, roughly guessed, of two to one over the American craftsman in monetary units. Having seen fashion come and go, they prefer timeless designs that wear their age well.

The Alsops have selected a mode of expression which stems directly from their own intermeshing personalities, and that mode aims unwaveringly at pure strong form, finalized to superb finish. The designs themselves are totally collaborated start to finish. A design is subjected to merciless examination and dissection in order to determine its potential. The steps to production, processes involved, demands on shop equipment

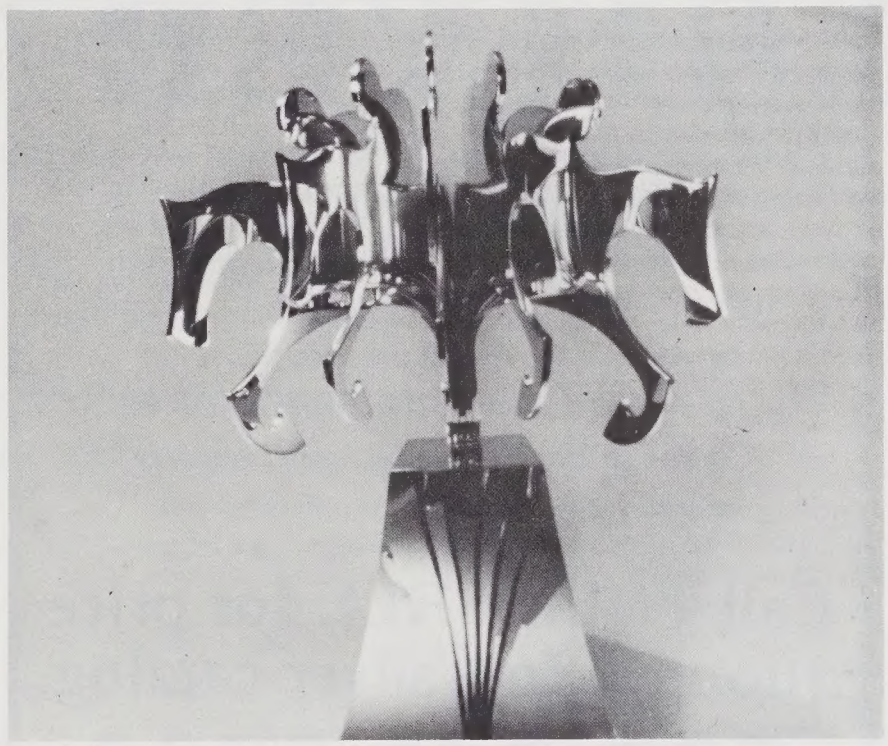
capacity, availability of stock silver gauges, prevailing market trends, etc., all must be analyzed; for in the end - the design must pay for itself. If it is accepted as a feasible candidate, it goes into production. Naturally some designs are continued longer than others, but seldom does a line reach one hundred examples before being retired. New designs are constantly under consideration.

Geoffrey determines the most economical steps in the execution of the piece, and Margaret works out any new tools necessary to reduce the time requirement. Geoffrey concentrates on the overall production while Margaret keeps the books and arranges exhibitions for their work. They are founding members of the Designers Jewellers Group, an organization of 25 designers who function together to promote their own work through exhibitions in retail shops and participation in jewelers' fairs.

Their business took a substantial step forward a few years ago when Michael Gatrell became their sales representative, and took over Margaret's responsibility of expanding their market. Michael, who trained in industrial design and had been in the retail jewelry business, is a very enthusiastic and sympathetic supporter of their work. He travels the U. K. promoting their work along with that of two other designers. Since Michael joined forces with the Alsops, their business has steadily expanded to include sales in other countries, most notably Japan.

In January 1978, they moved their studio into larger quarters and hired an apprentice to assist in production. Now a year and a half later the question of another employee is under discussion. Their ultimate plan is to expand to a workshop of four employees, stop there, and consolidate. Their approach would not be significantly altered from their present formula and division of labour, but some shifting of emphasis could probably be achieved. Commissions, which are not actively pursued, do come to them, usually through the jewelry firms they supply, and comprise about 15% of their total work. As their reputation continues to grow, it would seem reasonable to expect the demands for the private commission to increase. The Alsops have taken a perceptive look at their art world, their potential patrons, the public at large and have come to understand their shopkeepers' point of view. Drawn heavily from inner discipline and realistic planning, the development of their independent studio has grown rapidly, in spite of a fortuitous British recession.

Their method could not be duplicated precisely in the U. S. because the support for this type of approach is largely non-existent. Theirs is a system built on interaction and the American ideal, which centers around the one-off - the personal statement with heavy emphasis on personal reputation - is not conducive to that approach. Indeed, one would have to look long and hard to find an enthusiastic adherent to this



Horse Trophy for Horse of the Year Show 1976

soft-spoken, but highly creative and rewarding life style, and in a way, that is a shame.

Having been exposed to both systems for many years, I cannot help but feel Americans would benefit from more individualized routes in delivery of their work to the public - if that is important at all, instead of the main thrust being the smashing one-off statement, made to communicate more often within the artist-to-artist dialogue, the endless trail of exhibitions for the sake of exhibitions - Lord may the list grow long - and the tendency towards dependence on the academic arena as the essential way of the craft world.

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A SURVEY OF ARTISTS/ CRAFTSPERSONS' ATTITUDES TOWARD COMPETITIVE EXHIBITIONS

by Robert Cardinale & Adria Arch
University of Arizona

Competitive exhibitions are a fact of life for artists and craftspersons in today's art world. The phenomenon is certainly not a new one, for we find evidence of competitions in Vasari's Lives of Artists as early as the 1400's. We read about the definite stipulations for the doors on the baptistry at the Cathedral of Florence for which the sculptor, Ghiberti, is so famous. Judging from current trends, competitive exhibitions will be with us for many years to come.

In light of these facts and observations, a questionnaire was designed and sent to approximately 500 practicing artists/craftspersons in the United States, Canada and Mexico. Although the questionnaire was related directly to the national Copper, Brass, and Bronze Competition and Exhibition for 1977, the wording of the ten items was general enough to elicit the opinions and attitudes of a sizeable number of craftspersons from around the U. S. and its border countries.

The sample we are dealing with comes from those craftspersons who responded to advertising about the national Copper, Brass, and Bronze Exhibition (some 4,000 fliers were sent to colleges and schools of art across the United States). In addition to this solicited sample, announcements were published in a number of national arts and crafts periodicals.

Approximately 190 questionnaires were returned by the artists (out of 500 + artists who submitted slides for jurying), a 38% return rate. Each questionnaire was marked so that the investigators would be able to identify the responses of the artist/craftspersons who were accepted into the exhibition from those who were rejected. See box for sample questionnaire and composite responses.

COMMENTS

The questionnaire contained a request for comments concerning the area of competitive exhibitions. These comments were compiled and those appearing most frequently are listed below:

1. Juried shows are only as good as the jurors — they reflect the concepts of the jurors in relation to current trends.
2. Jurying from slides is an inadequate way to conduct an exhibition.
3. Theme shows are preferred to open, general exhibitions.
4. "Names" in metalwork keep showing up in major shows— there is some contention on part of respondants that possibly 'names' are judging each other's shows.
5. Entering juried shows is a gamble whether one is an established craftsperson or not, as these shows are simply several people's opinion.

Finally, the most frequent comment was that artist/ craftspersons felt they should be informed of the reasons for their rejection (or acceptance). Since they had expended the energy to enter, they felt some explanation was due them for their effort. In general, the artists were aware of politics and problems in exhibitions, but they wisely stated since there are so many shows and chances, it all seems to even out in the end.

CONCLUSION

This survey produced little startling information. Many of the responses were anticipated, but now we have more evidence to support our beliefs.

In summary, we believe that competitive juried exhibitions are and will continue to be important events in the art world and for individual artists; that large national exhibitions may become a thing of the past because of tremendous logistical problems; and that small (10 - 25 artists) exhibitions focusing upon a theme, media, or technique will be a positive direction for the future.

We strongly recommend that all juried exhibitions develop a positive, critical form to be filled out by jurors, which will be returned to all artists submitting works for exhibition. This task, although difficult, would not be overly burdensome if exhibition size were reduced as suggested. Competitive exhibitions have a responsibility to show the finest selection of work possible, yet at the same time, they should strive to raise the critical awareness level of the general public and individual craftsmen toward the arts.

KEY: "AS" – agree strongly; "A" – agree; "D" – disagree; "DS" – disagree strongly

	"AS"	"A"	"D"	"DS"
1. Competitive juried exhibitions stimulate high-quality work by individual artists/craftspersons.	X	X		
2. Competitive juried exhibitions encourage the unknown artist/ craftsperson.	X	X		
3. Participation in competitive, juried exhibitions helps to establish recognition among other artists/craftspersons.	X	X		
4. Competitive juried exhibitions insult the established artist/ craftspersons.			X	X
5. Competitive juried exhibitions are a threat to established artist/ craftspersons.			X	X
6. Competitive juried exhibitions encourage and support current trends.		X		
7. Competitive juried exhibitions encourage artists/craftspersons to work to please jurors.		X	X	
8. Competitive juried exhibitions reward dominantly masculine type of competitive spirit.			X	
9. Competitive juried exhibitions should be free for all to enter.		X		
10. The National Endowment for the Arts and other organizations specifically committed to the crafts support competitive juried exhibitions.		X		

COMMENTS: _____

ORGANIZATIONAL NEWS

SOCIETY OF NORTH AMERICAN GOLDSMITHS

ANNUAL CONFERENCE

TUCSON, ARIZONA

MARCH 20, 21, & 22, 1980

"CONTEMPORARY COPPER"

The conference will focus on copper and its alloys in contemporary use. Among other features will be — a visit to Copper 2, the national competitive exhibition at the University of Arizona Art Museum — a tour of a copper mine and smelter for a technical look at the extraction of ore and production methods — technical papers and lectures — optional side trips to Mexico; the Arizona-Sonora Desert Museum and San Xavier del Bach (a Spanish mission church on the Papago Indian reservation); Amerind Foundation (the nation's premier American Indian Museum) — the "Saw, Solder & File Sprints"— Mexican food — a barbeque and beer bust.

Registration fee:
Members — $60
Non-members — $75

For further information on registration, contact: Michael Croft, 1441 North Day Road, Tucson, Arizona 85715 OR The Arizona Connection, 4400 East Broadway, Tucson, Arizona 85711

PRESIDENT'S REPORT — DECEMBER, 1979

The Tucson conference is scheduled for March 20 - 22, 1980, and not the following week as I stated in the October Journal. Specific presentations will be decided upon in mid November. Your Board is also working on the editor change for our Journal and it is expected that this will also be finalized by early December.

In talking with Sandie Tillker the other day, the importance of archives was mentioned — of gathering together a record of what is happening so as to be available for future reference. Exhibition catalogs are a good record which can easily be lost. Most are not the sort of publications easily obtainable much after the show is down. They are limited editions and not reprinted.

What do you think of SNAG starting a collection of exhibition catalogs, posters, etc.? If we could find a volunteer to be our 'librarian,' then encourage members, galleries, museums, etc., to send us a copy of any current show documentation, we could make a permanent location where these materials could be available for research, but in the meantime, should we not begin collecting and saving these materials? What is your opinion? Is there someone who would like to volunteer to undertake this job? Someone who has some spare bookshelf space?

Once this is established, would there be members willing to donate their catalogs, especially older ones, which will be of increasing interest and value to historians in our field? I know many of us are very protective of our catalogs, but could you consider SNAG, and future students of our field, worthwhile keepers of them?

Let me know.

I should have much to report next time, until then — best wishes for the holiday season.

Mary Lee Hu
Art Department
Michigan State University
East Lansing, MI 48824

NOMINATING COMMITTEE

The Nominating Committee is requesting nominations and suggestions for positions which will become vacant in 1980. Elections will be held for president and vice-president — 2-year terms; and for one board member — 4-year term.

If you wish to be nominated or to nominate another pro-member, please contact either: Eleanor Moty, Art Dept., 6241 Humanities Bldg., University of Wisconsin, Madison, WI 53706; Jamie Bennett, Program in Artisanry, Boston University, 620 Commonwealth Avenue, Boston, MA 02215; or Robert Ebendorf, R. R. 1, Box 187, Highland, NY 12528.

Deadline for nomination is January 15, 1980.

SNAG AUDIO VISUAL SERVICES

When a person submits a portfolio and is accepted as a pro-member, that group of slides becomes the basis for the major part of our rental library. The sets are kept up-to-date by the member on a regular basis. The sets are catalogued by individuals in separate carousels. Three copies of each set are available for rental.

Rental Fees

Pro-member	$2.00
	(Postage costs)
Associate & Student	$7.00
	(rental plus $2 postage)

Available Sets

Individual	No. in set
Abramson, Maurice	37
Adams, Jay	20
Arentzen, Glenda	54
Armstrong, Roger	20
Bagnal, Joel	21
Baldridge, Mark	20
Bennett, Jamie	45
Bernstein, Bernard	25
Betteridge, Lois	25
Blodgett, Peter	25
Bondi, Steven	20
Choo, Chunghi	20
Daunis-Dunning, Patricia	32
Davidson, Jaclyn	31
Dejong, Bev	39
Dipasquale, D.	20
Ebendorf, Bob	60
Evans, Chuck	32
Evans, Gerry	29
Fenster, Fred	13
Fike, Philip	20
Fisch, Arline	27
Fisher, Robert	26
Fix, John	20
Fossee, Jackie	23
Gabriel, Hannelore	40
Getty, Nilda	35
Gold, Debra	25
Graham, Anne Krohn	20
Griffin, Gary	46
Gunter, Randall	20
Hanes, Drewry	20
Helzer, Richard	41
Hentz, Chris	20
Higgens, Ed	20
Hu, Mary Lee	58
Johnson, Don	34
Kallenburger, Klaus	27
Keens, David	24
Kielman, Hero	20
Kuehnl, Claudia	25
LaRoche, Lynda	20
Larson, Gail	20
Leupp, Leslie	27
Lewis, Marcia	58
Link, Val	40
Loyd, Jan Brooks	20
McLean, George	53
Mafong, Richard	25
Malenda, Jim	35
Markusen, Tom	65
Marshall, John	48
Martin, Eric	28
Matzdorf, Kurt	80
Mawdsley, Richard	49
Mazurkewicz,	20
Mergen, Paul	20
Metcalf, Bruce	20
Meyer, Jim	26
Michaels, Eunice	22
Minor, Barbara	20
Mitchell, Robert	20
Montgomery, Robert	10
Morris, Kelley	20
Morton, Phillip	21
Moty, Eleanor	37
Muller-Stach, Dieter	20
Myers, Paulette	32
Neumann, William	20
Niemi, Edwin	41
O'Connor, Harold	80
Paley, Albert	80
Paul, Natalie	30
Peck, Lee	25
Phillips, Carol	22
Pijanowski, Gene	24
Pijanowski, Hiroko	26
Pijanowski, H & G	31
Pimentel, David	27
Renk, Merry	20
Ross, Hal	32
Sandretto, Thomas	20
Scherr, Mary Ann	36
Schick, Marjorie	20
Schwarcz, June	20
Seavey, James	20
Seppa, Heikki	22
Shirk, Helen	27
Skoogfors, Olaf	18
Small, Carol	20
Smith, Jo-An	37
Snyder, Toni	29
Soellner, Walter & Soellner, Mitsuko	42
Spavings, Mary Ann	28
Spivak, Laurie	26
Steakley, Douglas	28
Stephen, Francis	20
Tawa, Roger	25
Trunkfield, Mona	28
Vallane, Olli	28
Watson, Lynda	37
Woell, Fred	80
Zilker, Sandra	33

Also Available:

SURVEY SET — Composed of three examples of each pro-member's work plus a slide of the person, when available. Housed in 3-140 slide carousels.

Rental Fees

Pro-member	$ 6.00
Associate & Student	$20.00

Available for Purchase:

SNAG European Show — 140 slide set of juried exhibition of 131 pieces by 39 pro-members.

After November 1, 1979

Pro-members	$120.00
Associate & Student	$130.00
Non-members & Inst.	$140.00

16mm FILM — 13 minute film, with sound. Documents and traces SNAG's development and growth.

Rental Fees

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MEMBERS NEWS

CARRIE ADELL, AMERINDA, JAMES BARKER, JOHN BIAZO, ANNE GRUNDLER, WILLIAM MICKLE, LEE PECK, MERRY RENK, ALAN REVERE, HAL ROSS exhibited in Jewelry 1980 at Contemporary Artisans, CA.

HALE ANDERSON, AMY DAVISON, WILLIAM DEXTER, DAVID KEYES, ALEX MCLACHLAN, MARTHA GLOWACKI and CAROL KUMATE have been invited to exhibit next season after participating in Pensacola National Crafts Exhibition in March.

NANCY BARRETT, BARRY MERRITT and ANNE BESSE-SHEPHERD gave workshops at The Worcester Craft Center, MA this fall.

DAVID BENEDEK won First Award — Silver for a fabricated sterling arm bracelet in the Second Annual JMAS Design Competition.

DENNIS DEJONGHE participated in the Morristown, NJ Craft Market and then moved to St. Croix, Virginia Islands, where he will be production manager, designer and set up casting operations for Pegasus Jewelry Shop.

KATHLEEN DOYLE and JANET HARRIMAN have both been accepted as exhibiting members in Piedmont Craftsmen.

PHILIP BALDWIN and DAVID FREDA are resident craftsmen for a year at Oregon School of Arts and Crafts.

PAT GARRETT participated in Art in Modern Handcrafts, Museum of Art, Carnegie Institute, Pittsburgh; Adult Toys at Mindscape; a group show at Yamato House in Lenox, MA; the Morristown Craftsmarket; and was featured in "Portfolio" in American Craft.

VAL LINK exhibited in "Texas Crafts" this summer.

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HANNELORE GABRIEL taught at Penland School of Craft in September. She is exhibiting at "Beaux Arts Designer Craftsmen 79" at the Columbus Museum of Art and "Fine Forgery" at Peters Valley. She gave lectures and workshops on making a living as a metalsmith to Jon Havener's class at University of Kansas, Long Beach City College to the class of Marcia Lewis, California State University, Long Beach to the students of Al Pine and Dieter Mueller-Stach and to Helen Shirks' students at San Diego State University. Hannelore and Jon Havener both received an award at the 48th Plaza Art Fair in Kansas City.

STUART GOLDER has received an individual artist fellowship from the Ohio Arts Council. He also won a fine arts award at the 1979 Ohio State Fair art exhibit and has two pieces exhibited in the Marietta Crafts National.

JANIS KERMAN-WHYTE participated in a group show during Nov. at the Upper Edge Gallery, Kingston, Ontario and had a piece accepted into the touring Quebec/Ontario Craft Competition.

MARK KNIPE has a one-man show Nov. - Dec. 24 at Foree Johnson Metalsmiths, NC.

H. A. MOLENAAR has begun a teaching tournee in Scandinavia: Oslo, Stockholm, Helsinki, Kopenhague. In the spring he will be back in the U. S. teaching and attending the SNAG conference.

ELEANOR MOTY gave a lecture at the Renwick Gallery this fall on "View of Contemporary Jewelry."

ROBERT MCCALL won a purchase award for a sterling and goldplate pin at the Pensacola National Crafts Exhibition.

LINDA MACNEIL was awarded one of six 1979 Crafts Fellowships given by the Massachusetts Council on the Arts and Humanities.

BILL NEUMANN exhibited solo at Contemporary Crafts Gallery, OR, this summer.

HAROLD O'CONNOR exhibited at Silverworks, CO, Oct. - Nov.

PAHAKA, GLENDA ARENTZEN, CHUCK EVANS, JULIE SHAW, GAYLE SAUNDERS, SUSAN COHAN, MARCI ZELMANOFF were some of the invited participants in "Limited Editions" at the Los Angeles Craft & Folk Art Museum held Oct. - Nov.

TONI GOESSLER-SNYDER and BRUCE METCALF were featured separately at the Helen Drutt Gallery, PA this fall.

DOUG STEAKLEY won first prize in the jewelry section of the California State Exposition in Sacramento. He has also accepted a part-time teaching position at Cabrillo College in Aptos, CA and conducted a two-day workshop in holloware techniques at Fort Wright College in Spokane, WA.

NEW MEMBERS

We would like to welcome the following new members to SNAG:

ASSOCIATE MEMBERS

Alderdice, Cynthia, Annapolis, MD
Allison, Zoe, Columbus, GA
Aronov, Noel, Tempe, AZ
Bachrach, Lilyan, Worcester, MA
Bardarik, Beverly, Rochester, NY
Bensman, Marcie, W. Bloomfield, MI
Berman, Mona, New Haven, CT
Bouchard, John, Waterville, ME
Chapple, Georgia, Wilson, NC
Clark, Paula, San Francisco, CA
Cohn, Robert, Solvang, CA
Conner, Rachel, Huntington, WV
Cooper, Steven, Bloomfield, NJ
D'Agostino, Lisa, Ames, IA
Dumas, Rose Marie, Piscataway, NJ
Farra, Wayne, Madison, WI
Ferro, Dickie, San Angelo, TX
Friedman, Ramie, Brookline, MA
Geller, Joan, Rome, ITALY
Geryak, Michael, Silverton, CO
Gordon, William H., San Antonio, TX
Gottschalk, Helen, Launceston, Tasmania, AUSTRALIA
Gretz, Richard, Corvallis, OR
Grossman, Leonard, Worcester, MA
Guerrero, Brian, Santa Barbara, CA
Hatfield, James, Oklahoma City, OK
Helmich, Susan, Long Beach, CA
Hite, Sunny, Terre Haute, IN
Jakel, Janice, West Orange, NJ
Kraus, Hilda, Westport, CT
Loverin, Neal, Charlotte, NC
McCormick, Rod, Philadelphia, PA
McGuire, Molly, Laguna Beach, CA
McMath, Elizabeth, Dallas, TX
Manwaring, Wendy, Gordon, NSW, AUSTRALIA
Marquit, Lawrence, Nashua, NH
Mench, Pali, Kailua, HI
Metzenberg, Helene, Madison, WI
Miranda, Rishar, Ann Arbor, MI
Raible, Kent, Fairfax, CA
Regan, Tim, Garden City, KS
Richards, Alexandra, Houston, TX
Ridge, Debbie, New York, NY
Rogovin, Harold, Califon, NJ
Russell, Marion, Pleasantville, NY
Ryzar-Anderson, Marybeth, Castle Rock, CO
Sanders, Michael, Covington, KY
Schiltz, Rita, Adrian, MI
Schlecht, Thomas, Southold, NY
Schogel, Eleanor, Roslyn, NY
Schurmeier, Jerome, Wheaton, IL
Shalman, Sami, New York, NY
Spencer, Edward, Boston, MA
Spend, Sara, Isle of Palms, SC
Sponholtz, Elaine, South Miami, FL
Stella, Linda, Stone Ridge, NY
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